The Veterinary Products Committee and its Sub-Committees

Annual Report 2007

The Veterinary Medicines Directorate (VMD) provides administrative support to the Veterinary Products Committee (VPC) and its sub-committees. Contact details are:

Committee Support Team, VMD, Woodham Lane, New Haw, Addlestone, Surrey, KT15 3LS (tel: **01932 336911**, email: **vpc@vmd.defra.gsi.gov.uk**, fax: **01932 336618**), or

Colin Bennett (Secretary, VPC)	Direct line: email:	**01932 338490** **c.bennett@vmd.defra.gsi.gov.uk**
Carol Brailsford	Direct line: email:	**01932 338492** **c.brailsford@vmd.defra.gsi.gov.uk**
Clare Main	Direct line: email:	**01932 338491** **c.main@vmd.defra.gsi.gov.uk**
Chris Abbott	Direct line: email:	**01932 338353** **c.abbott@vmd.defra.gsi.gov.uk.**

Further copies of this report, and all reports referred to, are available from the Committee Support Team. Alternatively, the reports can be viewed or downloaded from the VPC's website (**www.vpc.gov.uk**).

If you would like to report a suspected adverse reaction involving a veterinary medicinal product, or if you want further information on the Suspected Adverse Reaction Surveillance Scheme (SARSS), please contact the SARSS team at the VMD, Woodham Lane, New Haw, Addlestone, Surrey, KT15 3LS (tel: **01932 336911**, email: **postmaster@vmd.defra.gsi.gov.uk**, fax: **01932 336618**), or

Denise Burge	Direct line: email:	**01932 338427** **d.burge@vmd.defra.gsi.gov.uk**.

THE VETERINARY PRODUCTS COMMITTEE AND ITS SUB-COMMITTEES

ANNUAL REPORT 2007

SECTION 1

INTRODUCTION

THE VETERINARY PRODUCTS COMMITTEE, ITS SUB-COMMITTEES AND WORKING GROUPS

THE VETERINARY PRODUCTS COMMITTEE, ITS SUB-COMMITTEES AND WORKING GROUPS

BACKGROUND

The Veterinary Products Committee (VPC) was established in 1970 under Section 4 of the Medicines Act 1968 (the Act). The VPC took over from the Advisory Committee on Pesticides and other Toxic Chemicals which had, until then, been responsible for advising the Health and Agriculture Ministers on the administration of the voluntary Veterinary Products Safety Precautions Scheme, established in 1964 for the scrutiny of veterinary medicines.

On 30 October 2005 the Act was disapplied to veterinary medicines by the Veterinary Medicines Regulations 2005 S.I. No 2745 (the Regulations). However, the statutory requirement for the VPC was retained. The Regulations are updated and replaced annually.

VPC TERMS OF REFERENCE

On the recommendation of the VPC, Ministers agreed revised terms of reference for the Committee effective from 30 October 2005.

In November 2007, again on the recommendation of the VPC, Ministers agreed that these terms of reference should be amended to include animal test certificates at ii).

The Committee's terms of reference are:

"**The Veterinary Products Committee is a statutory committee established to:**

i) provide the Secretary of State with scientific[1] advice on any aspect of veterinary medicinal products and specified feed additives;

ii) hear representations on decisions relating to the granting, refusal, variation, suspension or revocation of a marketing authorisation for a veterinary medicinal product or an animal test certificate;

iii) promote the collection of information relating to suspected adverse reactions for the purpose of enabling the advice at i) above to be given.

Each year the Veterinary Products Committee will publish a report of its activities and those of its sub-committees.

[1] **Scientific advice means all aspects, including risk/benefit analysis, of the safety, quality and efficacy of a veterinary medicinal product apart from regulatory issues.**"

THE ROLE OF THE VPC

The main role of the VPC is to offer advice to the Veterinary Medicines Directorate (VMD) on behalf of the Secretary of State, in respect of applications for new and renewal Marketing Authorisations (MAs), Provisional MAs (PMAs), variations to MAs and Animal Test Certificates (ATCs).

In the majority of cases, the VMD decides whether an application is to be approved. The VPC is consulted where there are specific scientific issues on which the VMD requires advice. In these cases, VPC members with the appropriate expertise to address the concerns raised by the VMD are identified in advance of the meeting and asked to lead the discussion.

To assist the VPC, the VMD prepares a report, which identifies the issues on which the VPC's advice is required. These issues will have been agreed by one of two peer review groups within VMD: the Scientific Secretariat for applications relating to pharmaceutical products and the Biologicals Committee for immunologicals. The report is distributed to all members including the 'lead' member(s), who also receive a copy of all the relevant data submitted by the applicant.

The application is introduced at the meeting by the 'lead' member(s) and the discussion is then opened up to members. VMD staff involved in its assessment are present for the discussion in order to answer questions at the Chairman's invitation. At the end of the discussion the VPC advises the VMD of any issues that it considers should be resolved with the applicant before the application may be approved.

Following the meeting the VMD considers the VPC's advice and then informs the applicant whether the application is to be granted, refused, or granted other than in accordance with the application and, if appropriate, offered the opportunity of appealing against that decision, to the VPC.

In the case of a refusal, if the applicant fails to respond to the offer of an appeal or, if having accepted the opportunity to appeal, fails to submit a response by the agreed deadlines, the VMD will confirm its decision. If the applicant wishes to make an appeal to the VPC either orally or in writing, all the outstanding issues must be addressed but no new data may be submitted. The VMD will advise the applicant of the outcome of the appeal when the minutes of the VPC meeting have been confirmed.

MEMBERSHIP

Members of the VPC and its sub-committees are appointed for four years and the terms of office of, approximately, half of the members come to an end every two years.

They are appointed, in accordance with guidelines issued by the Office of the Commissioner for Public Appointments (OCPA), for their expertise in a wide range of disciplines relevant to human and animal health or the environment.

The Chairman of a sub-committee will be a VPC member with the appropriate expertise. Members of the working groups are, generally, VPC members, although other experts may be co-opted if necessary.

The area of expertise represented by the membership is reviewed regularly by both the VPC and officials and, where gaps are identified, the Secretary of State may be asked to approve the appointment of new members. For example,

two lay members were first appointed to the VPC in 1998 to provide the public with an assurance that the issues before the VPC have been properly considered;

a working farmer was appointed in 2000 to provide the VPC with advice in the area of the on-farm use of veterinary medicines; and

in 2001, following an agreement with the Food Standards Agency (FSA), a member was appointed to provide the VPC with advice on food safety.

For each meeting they attend, members are entitled to claim a preparation fee of £72 and an attendance fee of £142 (the Chairman's fees are £90 and £178 respectively). In addition, members can claim an extra preparation fee of £72 for each additional item on which they are asked to lead at any one meeting. Travel and subsistence is also payable within Department for Environment, Food and Rural Affairs' (Defra) guidelines.

DECLARATION OF INTERESTS IN THE PHARMACEUTICAL INDUSTRY

The advice of the VPC concerns matters that are connected with the pharmaceutical industry and it is therefore desirable that members should have a good understanding of the work of the industry. It is also desirable that some members should have practical experience of the scientific problems of product development. The pharmaceutical industry relies heavily on the advice of doctors, veterinarians and pharmacists outside the industry in, for example, the universities. To avoid any public concern that commercial interests might affect the advice of the VPC, Ministers have decided that the arrangements which govern relationships between members and the pharmaceutical industry and information on significant and relevant interests should be on public record.

The circumstances in which the Chairman and members should declare an interest in the pharmaceutical industry are provided in the Code of Practice for Members of the VPC and its Sub-Committees (the Code).

The Code requires members to declare, amongst other things, 'non-personal interests' that may include, for example, payments that may benefit a department for which a member is responsible, but are not received by the member personally. This is exemplified in the declarations of those members holding senior executive positions in universities or research institutions who have declared as non-personal interests all the relevant projects that are carried out at the university/institution for which they are responsible, even though they are not directly involved in all of them.

The Code and a summary of the interests of members of the VPC, its sub-committees and working groups are set out in **Annex A** and **B** respectively, and are also available on the VPC website.

SUB-COMMITTEES AND WORKING GROUPS

The VPC establishes sub-committees to address long term issues. The Chairman of a sub-committee will be a member of the VPC with the appropriate expertise. Members are appointed in accordance with the procedures approved by the OCPA.

A working group will be established to address specific issues and report its findings back to the VPC. The Chairman and members are, generally, VPC members although, if there is a specific need experts, in specialised areas not represented on the VPC, may be co-opted onto a working group.

Details of all sub-committees and working groups established by the VPC are given at **Annex C**.

OFFICIALS

The VPC and its sub-committees receive secretariat support and advice from officials of the VMD. Other government departments with an interest in the issues under consideration also provide advice. Officials are not members of the VPC or its sub-committees but may attend meetings or provide written advice. Officials from the Department of Health, the Environment Agency, the FSA, the Health and Safety Executive, the Health Protection Agency and the VMD regularly attend meetings.

The advice received is acknowledged by the VPC and sub-committees in their respective sections of this report.

FREEDOM OF INFORMATION

The Freedom of Information Act 2000 requires all Non-Departmental Government Bodies to have an approved publication scheme in place. The VPC's publication scheme is available, free of charge, from the Committee Support Team and on the VPC website. A list of the VPC's publications is given at **Annex D**.

All VPC reports, summary minutes of VPC meetings held since 2000, summary minutes of meetings of the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines held since March 2004, summary minutes of meetings of the Medical and Scientific Panel held since October 2004 and all papers not subject to commercial confidentiality are available free of charge from the Committee Support Team and on the VPC website.

SECTION 2

THE VETERINARY PRODUCTS COMMITTEE

ANNUAL REPORT 2007

THE VETERINARY PRODUCTS COMMITTEE ANNUAL REPORT 2007

CHAIRMAN'S INTRODUCTION

Welcome to the Veterinary Products Committee's annual report 2007.

The decline in the number of applications, national and European, being considered by the VPC, which began following the introduction of the Veterinary Medicines Regulations in October 2005, has continued. We have, however, considered appeals by two Marketing Authorisation (MA) holders against the intention of the Veterinary Medicine Directorate (VMD) not to renew three MAs.

We have spent much of our time this year considering the recommendations of the Sub Group on the Review of Distribution Categories and the proposal for a new distribution category for products which first required a clinical assessment by a veterinary surgeon but which could then be supplied by any veterinary surgeon, pharmacist, or suitably qualified person.

We have also continued to receive regular summaries prepared by the VMD of reports of suspected adverse reactions (SARs) and have been particularly concerned by the incidence of reports of suspected lack of efficacy, especially in relation to products for use in poultry, ectoparasiticides authorised for use in sheep, and parvovirus vaccines; the number of reports concerning an antimicrobial authorised for use in cats and dogs, of which a large proportion of the cases were off-label use, and the number of SARs in cats resulting from the mis-use of a spot-on product authorised for use in dogs.

David Skilton BVSc, MRCVS
Chairman

THE VETERINARY PRODUCTS COMMITTEE ANNUAL REPORT 2007

APPOINTMENTS, RE-APPOINTMENTS AND RETIREMENTS

In August the Department for Environment, Food and Rural Affairs (Defra) announced the appointment of six new members to serve on the VPC with effect from January 2008: Dr Anil Adisesh, Mr Christian Fox, Dr Robert Jefferson, Professor Andrew Peters, Mr Peter Southgate and Mr Michael Stevenson. The re-appointment of the Chairman, Mr David Skilton, and Mr Dave Arnold, Dr Alastair Boxall, Professor Barry Cookson, Professor John Gilleard, Mr Fred McKeating and Professor Stuart Reid for terms of office from 1 January 2008 to 31 December 2011 was also confirmed.

In December Professor Tar-Ching Aw, Mrs Rosemary Collingborn, Professor Michael Day, Dr Peter Greaves, Dr John Thompson and Mr Tony Wall retired from the VPC. The Chairman thanked them all for their valuable contribution to the work of the VPC.

A list of members is provided at **Appendix I** and brief biographical details of all members are available, free of charge from the Committee Support Team and on the VPC website.

MEETINGS

The VPC held six regular meetings at the Veterinary Medicines Directorate (VMD). In addition, the VPC held its special (horizon scanning) meeting in July when it received presentations on:

Neuropsychiatric Symptoms in Past Users of Sheep Dip and Other Pesticides, by Professor David Coggon, Medical Research Council;

Suitably Qualified Persons: Training and Examination, by Professor Philip Thomas, Animal Medicines Training Regulatory Authority;

Trends in Veterinary Medicines: The Move Towards Companion Animals, by Mr Graham Dick, Bayer Plc; and

Effects of Climate Change on Livestock Diseases and Veterinary Medicines, by Dr Paul Gale, Veterinary Laboratories Agency.

On behalf of the VPC, the Chairman expressed his thanks to the guest speakers for an enjoyable and informative day.

The VPC held its open meeting in November at the Barbican, London. After an introduction by the Chairman on the work of the VPC, there were presentations on:

Anthelmintic Resistance, by Professor John Gilleard, VPC member;

Environmental issues, by Mr Dave Arnold, VPC member, and

Risks in Using Human Medicines Under the 'Cascade', by Dr John Thompson, VPC member and Chairman of the VPC sub-committee, the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines (Appraisal Panel).

After a short question and answer session the Chairman thanked everyone for attending and making the meeting such a success.

A report of the open meeting, including the presentations, is available, free of charge, from the Committee Support Team and on the VPC website.

COSTS

The cost of the VPC, its sub-committees and working groups in 2007 was £138,689. A summary of the 2007 costs and a comparison of costs 2003 - 2007 are given at **Annex E**.

AUTHORISATION OF VETERINARY MEDICINES

The VPC's role in the authorisation procedure is explained in **Section 1** of this Report. The authorisation procedure is summarised at **Annex F**.

National applications

The VPC considered a total of eleven applications relating to one Marketing Authorisation (MA), the renewal of five MAs, the variation of four other MAs, and an application for an Animal Test Certificate (ATC), and gave advice to the VMD. The MA, ATC and one of the renewals were dealt with by correspondence. Three of the renewals took the form of appeals to the VPC against the VMD's intention to refuse the applications.

European applications

The VPC considered four MA applications under the European procedures: two under the Centralised procedure and two under the Decentralised procedure. In order for these applications to be determined within agreed timeframes they were considered by correspondence and the VPC's advice was incorporated into the UK's response to the European Medicines Agency's (EMEA) Committee for Medicinal Products for Veterinary Use (CVMP) for those applications considered under the Centralised procedure, and to other member states for those considered under the Decentralised procedure.

The authorisation of Feed Additives is also a European Union (EU) procedure and is co-ordinated by the European Commission. Individual VPC members comment on the assessment report and lists of questions on applications for which the UK acts as rapporteur. For the fifth consecutive year, the VPC did not consider any applications for feed additives.

A summary of applications considered by the VPC 2003 – 2007 is included at **Appendix II**.

SUSPECTED ADVERSE REACTIONS

Background

The Suspected Adverse Reaction Surveillance Scheme (SARSS) and a summary of reports received by the VMD are described at **Annex G**. Copies of the forms for reporting SARs in animals, human SARs to veterinary medicines, and environmental incidents are available at **Annex H**. The key information required from a reporter of a human SAR is given at **Annex I** and the Guidelines for the assessment by the Appraisal Panel of human SARs are given at **Annex J**.

The VPC continued to monitor veterinary pharmacovigilance activities through the reports compiled by the VMD's SARSS team, of

SARs in animals involving veterinary medicines provisionally classified as serious,

human SARs associated with the use or administration of authorised veterinary medicines, and

environmental incidents associated with the use or administration of authorised veterinary medicines.

The 1,643 SAR reports for the period September 2006 to October 2007 inclusive which were considered by the VPC are summarised at **Appendix III**. While the number of reports considered has increased over 2006, it should be borne in mind that, because the VPC meeting in November was cancelled, when it met in January the VPC considered reports from September and October 2006 as well as those from November and December. SAR reports received by the VMD in November and December 2007 will be considered by the Committee in January 2008.

SARs in animals

The Committee was concerned about the number of reports received of suspected lack of efficacy in relation to products for use in poultry, ectoparasiticides authorised for use in sheep, and parvovirus vaccines. The Committee was informed that, in particular, the VMD would monitor cases of suspected lack of efficacy to parvovirus vaccines.

The Committee also noted the numbers of fatalities in rabbits following vaccination against myxomatosis or viral haemorrhagic disease.

Following two cases of blindness in cats in connection with a fluoroquinolone other than enrofloxacin, the VMD agreed to monitor the occurrence of eye disorders in cats in connection with this class of antimicrobial. At the Committee's request, the VMD also agreed to monitor cases of anaphylactic-like reactions reported in a product for use in cattle, horses and sheep, with particular regard to the possibility of interaction with Bovine Viral Diarrhoea Virus vaccinations.

The Committee noted the large number of reports concerning an antimicrobial authorised for use in cats and dogs, of which a large proportion of the cases were off-label use where the product had been administered to seriously ill animals, particularly cats, as a last resort.

The Committee discussed the incidence of SARs in cats in connection with the mis-use of a spot-on product authorised for use in dogs and possible reasons for the inappropriate off-label use of the product.

The Committee remarked on the importance of good aseptic technique when using an intramammary product and discussed the difficulties that farmers encountered in dealing with the wipes provided with the product by the MA holder. The Committee was advised that the issue would be dealt with by the VMD at the time of the MA renewal.

Human SARs
The Committee also considered a number of reports of SARs occurring in humans. The Committee noted three reports of human SARs associated with a product for use in the treatment and prevention of flea and tick infestations in cats and dogs.

Members also commented on a report of an eye reaction in a person administering a product authorised for use in cats. Splashing occurred when the top of the plastic pipette containing the product was snapped off. The Appraisal Panel had recently reviewed eye reactions associated with splashing of product and had agreed that the incidence of such events was extremely low in relation to the sales volumes.

The Committee discussed a report of a SAR in a pet owner following the administration of a spot-on product to a dog. The pet owner had been smoking while applying the product and the Committee concluded that this could have led to the product being transferred to the mouth and ingested.

The Committee also considered a report of a pet owner who had suffered a miscarriage after exposure to a product for use in bitches. The Committee was concerned that veterinarians who prescribed the product might not be aware of any pregnant women in the household. It was confirmed that the case was under consideration by the Appraisal Panel and would continue to be investigated. The position and prominence of user warnings would be followed up by the VMD.

There were three reports of serious reactions following accidental self-injection of vaccines containing mineral oil, each of which involved hospital in-patient treatment.

Environmental incidents
The Committee noted 13 reports of environmental incidents which had occurred in Scotland, 11 incidents covering the years 2001 to 2006 inclusive which had occurred in Northern Ireland, and 17 (of which eight were minor incidents) that had occurred England and Wales.

OTHER ISSUES

Annual evaluation of the VMD's assessments of applications for national MAs
The Committee agreed with proposed procedures for the annual evaluation of the standard of assessments of applications for national MAs conducted by the VMD. The procedures will begin in January 2008.

Antimicrobial Sales Data Report 2006
In September the Committee considered and commented upon the VMD Antimicrobial Sales Data Report 2006. The report was published in December and is available free of charge from the VMD (tel: 01932 336911, fax: 01932 336618 or email: postmaster@vmd.defra.gsi.gov.uk) and on the VMD website.

Coccidiostats and histomonostats: future regulation
The Committee was informed that the European Commission had begun work on a report on the future regulation of coccidiostats and histomonostats. This issue had been considered previously by the VPC on the basis of the advice of its Working Group on Antimicrobial Resistance Report published in 2003 when it was agreed that these products should be regulated as veterinary medicinal products rather than feed additives. Initial comments from UK producers and manufacturers had not supported this approach citing concerns about reduced availability of product and reduced controls on their use. The Committee considered this point further and agreed that the current regulation of these products appeared to be well researched and assessed and advised the VMD that the regulation of prophylactic coccidiostats and histomonostats should remain under the feed additive legislation. The Committee was also informed that the VMD would write to the European Commission stating the UK's current position, the industry view and informing them that the UK position would be reviewed in the light of the recent industry comments.

Council Regulation to replace and repeal Council Regulation 2377/90
The Committee considered and commented upon a report of a proposal from the European Commission (EC) for a Council Regulation to replace and repeal Council Regulation 2377/90, which establishes procedures for setting Maximum Residue Limits (MRLs). The proposal set out three key components:

i) that Codex MRLs should be adopted by the EU without further risk assessment where the science is supported by the EU;

ii) the greater use of extrapolation of MRLs; and

iii) how to deal with substances not approved for use in the EU but which were persistently found in third-country imports.

Members were asked to submit comments on the proposal to the VMD so that they could be taken into account before the first Council Working Group meeting. The VMD agreed to keep the Committee informed of progress with the proposal and EC progress on proposals to make minor amendments to Council Directive 96/22 and a major revision of Council Directive 96/23.

Hormone residues in bovine meat and meat products
The Committee noted the publication, on 18 July, of the Opinion of the European Food Safety Authority's Scientific Panel on Contaminants in the Food Chain on Hormone Residues in Bovine Meat and Meat Products, which assesses scientific data published since 2002 on five hormonal substances.

Minority reports
At a member's request, the Committee considered whether it wished to revisit the subject of minority reports. As there was no clear support for the proposal, the Chairman, at the request of a member, called for a show of hands by those in favour, followed by those against, and those abstaining. The Chairman concluded that the Committee was against re-opening the issue.

Non-food animal blood banks
The VMD explained the application and authorisation process of the Non-Food Animal Blood Banks Scheme to the Committee. The Scheme mirrors that for a MA, whereby an applicant submits proposals for the procedures that they wish to follow as part of the data in support of an application. Once authorised the submitted procedural information as well as the quality data relating to storage etc. has to be followed and any changes have to be authorised by means of a variation before being adopted.

Further information on blood banks is available free of charge from the VMD and on its website (www.vmd.gov.uk).

Open meetings
The Committee considered opening up regular meetings to the public but agreed that, because of the limited agenda items that could be discussed in public and the disproportionate additional costs, it would not be possible for the time being. The Committee will, however, continue to hold its annual open meeting.

Terms of reference
The Committee agreed a proposal to amend its terms of reference to include consideration of appeals of VMD decisions on ATCs. The proposal was agreed by Ministers in November.

CONSULTATIONS

The VPC was one of a number of government scientific advisory committees to be asked to comment on the Interdepartmental Group on Health Risks from Chemicals (IGHRC) Draft Guidance Document 'Chemical Mixtures - A Framework for Assessing Risks'. Members were asked to submit their comments to the Committee Support Team and a consolidated response was submitted to the IGHRC in time to meet its deadline.

The Committee also considered a consultation package from the Office of Science and Innovation (OSI) concerning a revision to the Code of Practice for Scientific Advisory Committees. Members raised a number of issues which were included in the response to the OSI.

VPC SUB GROUP ON THE REVIEW OF DISTRIBUTION CATEGORIES OF AUTHORISED VETERINARY MEDICINES

In July 2005, following the Government's acceptance of recommendations in the reports of the Independent Review of Dispensing by Veterinary Surgeons of Prescription Only Medicines (the Marsh Report) and the Competition Commission on the Supply within the United Kingdom of Prescription Only Veterinary Medicines, the VMD published a consultation on a review of the Distribution Categories of Authorised Veterinary Medicines.

The consultation, which closed in October 2005, asked interested parties to make a case for any changes they wished to be made to the classification of products. The majority of comments received related to groups of products rather than specific medicines.

In view of the issues to be considered, the VPC was consulted by the VMD in March 2006. The VPC agreed to establish a sub group comprising a large animal veterinary surgeon, a

small animal veterinary surgeon, a veterinary immunologist, a pharmacist, an expert on risk analysis and a lay member, to provide advice to the VMD. A list of the members is provided at **Appendix IV**.

The purpose of the review was to make a risk assessment of the products and consider whether it was necessary to place a veterinary surgeon, pharmacist, or suitably qualified person (SQP) between a product and the animal to provide advice at the point of supply according to the benefit/risk balance of the product.

The sub group met in January to discuss and finalise the recommendations for cattle vaccines, pig vaccines, cat flea treatments, and horse vaccines, and presented its first report to the VPC in March. A member of the sub group put forward proposals for a new distribution category for products which first required a clinical assessment by a veterinary surgeon but which could then be supplied by any veterinary surgeon, pharmacist, or SQP.

The Committee concluded that the horse vaccines and cat flea treatment product groups could be carried forward and the other groups should be reconsidered by the sub group in the light of the proposed new category.

At the Committee's request, officials agreed to develop the proposal for the new distribution category and asked the sub group to continue its work, identifying those products which could be allocated to the new category. However, following an informal consultation of interested organisations by the VMD, the Committee was informed in September that there had been little support for the new category and, consequently, they considered that there was no merit in taking the matter forward to Ministers.

The sub group met again in March to consider dog non-steroidal anti-inflammatory drugs (containing carprofen), sheep anthelmintics, dog and cat anthelmintics, dog anthelmintics and cat anthelmintics and to reconsider its recommendations for cattle vaccines and pig vaccines, as requested by the VPC. It also received a presentation by Dr Roger Dawson, Animal Medicines Training Regulatory Authority, and Mr Carwyn Ellis, Harper Adams University College, on the training and qualifications of SQPs.

The sub group presented its second report to the VPC in May. The Committee referred the recommendations on the dog anthelmintics and cattle vaccines back to the sub group for further consideration and agreed the recommendations for the remaining products.

The sub group presented its third report at the July VPC meeting. It had met in May to consider dog and poultry vaccines and dog ectoparasiticides and reconsider its recommendations for a dog anthelmintic. The Committee referred the recommendation for a Newcastle Disease vaccine back for further consideration by the sub group.

In September the sub group presented its fourth report to the Committee. It had met in July to consider bee ectoparasiticides, bird anthelmintics, additional products containing pyriproxyfen, cat and dog ectoparasiticides, fish ectoparasiticides, multi-species ectoparasiticides, rabbit and fish vaccines, sheep and multi-species vaccines, small animal anti-inflammatories and multi-species anti-infectives and to reconsider its earlier recommendations for a poultry vaccine. The Committee discussed the report and expressed its wish for consistency of approach across the various therapeutic groups.

The Committee also considered the change of distribution category of certain oil adjuvant vaccines from Prescription Only Medicine-Veterinarian (POM-V) and was re-assured that there would be no additional risk to users as the person administering the product would not change as a result of a change to the distribution category. Committee members raised similar concerns over certain vaccines for use in sheep.

The Committee was also informed at the September meeting of the results of the VMD's first consultation exercise on horse vaccines and cat flea treatments, which had closed on 30 August. Details of all of the VMD's consultations will be made available on the VMD and VPC websites (www.vmd.gov.uk and www.vpc.gov.uk).

ACKNOWLEDGEMENTS
The VPC is most grateful to the:

MSP for the work it has carried out on Organophosphate sheep dips,

Appraisal Panel for its work on human suspected adverse reactions to veterinary medicines, and

Sub Group on the Review of Distribution Categories of Authorised Veterinary Medicines for its consideration of the classification of products.

The VPC is also grateful to officials of the Department of Health, the Environment Agency, the Food Standards Agency, the Health and Safety Executive, the Health Protection Agency, the Scottish Environment Protection Agency, the Central Science Laboratory and Defra for their advice to the VPC and its sub-committees. It also thanks VMD officials and the members of the Committee Support Team for their continuing support and assistance during the year.

MEMBERSHIP OF THE VETERINARY PRODUCTS COMMITTEE

CHAIRMAN

[1] **Mr David Skilton BVSc, MRCVS**
Consultant Veterinary Surgeon, Bramhall, Cheshire

MEMBERS

Professor Diana Anderson BSc, MSc, PhD, DipEd, CBiol, FIBiol, FRCPath, FIFST, FATS, ILT-M, FBTS
Specialism: Toxicology

[1] **Mr David Arnold BSc (Hons)**
Specialism: Ecotoxicology

[2] **Professor Tar-Ching Aw MBBS, MSc, PhD, FFOM, FRCP, FFPHM**
Specialism: Occupational Health/Hygiene

Dr Susan Bews BSc, MBBS, LRCP, MRCS, FFPM
Lay member

[1] **Dr Alistair Boxall PhD, BSc**
Specialism: Environmental Chemistry

Dr Andrew Bradley MA, VetMB, DCHP, DipECBHM, PhD, MRCVS (RCVS Specialist in Cattle Health and Production)
Specialism: Large Animal Vet

Dr Paul Brantom BSc, PhD, MIBiol
Specialism: Risk Analysis

Dr Sarah Cockbill LLM, BPharm, MPharm, PhD, DAgVetPharm, MIPharmM, FRPharmS, FCPP
Specialism: Pharmacy

Dr Paul S Collier BPharm, PhD, MRPharmS, MPSNI
Specialism: Pharmacology

[2] **Mrs Rosemary Collingborn BA**
Specialism: Working Farmer

[1] **Professor Barry Cookson MBBS, BDS, MSc, Hon DipHIC, FRCP (UK), FRCPath (UK)**
Specialism: Medical Microbiology

Dr Susan Dawson BVMS, PhD, MRCVS
Specialism: Virology/Infectious Diseases

[2] **Professor Michael Day BSc, BVMS (Hons), PhD, DSc, DiplECVP, FASM, FRCPath, FRCVS**
Specialism: Veterinary Immunology

Professor Jonathan Elliott MA, PhD, Vet MB, MRCVS, Dipl ECVP&T
Specialism: Pharmacology

[1] **Professor John Gilleard BVSc, PhD, DipEVPC, MRCVS**
Specialism: Parasitology

[2] **Dr Peter Greaves MB ChB, FRCPath**
Specialism: Toxicology

Professor Edward Houghton BSc, PhD, CChem, FAORC, FRSC
Specialism: Residues Analyst

Dr Steven Kayne BSc (Pharm), PhD, MBA, LLM, MSc (Med Sci), DAgVetPharm, FRPharmS, FCPP, FIPharmM, FFHom, MPS (NZ) FNZCP
Specialism: Pharmacy

Professor Len Levy OBE, BSc, MSc, PhD, FFOM, FBTS
Specialism: Toxicology and Risk Assessment

Mr Stephen Lister BSc, BVetMed, CertPMP, MRCVS
Specialism: Poultry Medicine

[1] **Mr Fred McKeating BVMS, FRCVS**
Specialism: Mixed/Companion Animal Veterinary Practice

[1] **Professor Stuart Reid BVMS, PhD, DipECVPH, FRSE, MRCVS**
Specialism: Statistics

Professor Bill Reilly BSc (Hons), BVMS, DVSM, FFPH, HonFRCVS, DipECVPH
Specialism: Veterinary Surgeon (Public Health)

Professor Bertus Rima MSc, PhD, FIBIOL, MRIA
Specialism: Molecular Biology/Genetics

[2] **Dr John Thompson MB ChB, BmedSci, FRCP**
Specialism: Clinical Toxicology

Mr John Verrall MRPharmS, DBA
Lay member

[2] **Mr Anthony Wall BVM&S, CERT V OPTHAL, MSc, MRCVS**
Specialism: Fish Medicine

[1] Re-appointed 1 January 2008
[2] Term of office ended 31 December 2007

SUMMARY OF APPLICATIONS CONSIDERED BY THE VPC 2003 – 2007

		2003	2004	2005	2006	2007
National	Marketing Authorisations	6	9	4	1	**1**
National	Provisional Marketing Authorisations	2	2	4	2	**0**
National	Marketing Authorisation Renewals	N/A	3	0	1	**5**
National	Marketing Authorisation Variations	5	3	11	6	**4**
National	Animal Test Certificates	3	0	1	1	**1**
European	Marketing Authorisations (Centralised)	7	9	11	8	**2**
European	Marketing Authorisations (Decentralised*)	N/A	N/A	0	3	**2**
European	Marketing Authorisations (Mutual Recognition)	18	10	4	2	**0**
European	Feed Additives	0	0	0	0	**0**
TOTAL		41	36	35	24	**15**

* the Decentralised procedure was introduced on 30 October 2005.

SARS REPORTS CONSIDERED BY THE VPC

			2003*	2004	2005	2006	**2007**
Animal	Provisionally categorised as possible SARs	Authorised use	N/A	637	679	465	653
		Non-authorised Use	N/A	123	99	105	137
	Provisionally categorised as possible non-SARs	Lack of efficacy	N/A	225	79	224	486
		Unauthorised product	N/A	21	10	13	16
		Unlikely to be product related	N/A	111	69	63	151
		ATC	N/A	0	2	2	2
	Animal Total		1,657	1,117	938	872	**1,445**
Human			90	82	106	112	**147**
Environment			9	14	81	56	**51**
TOTAL			1,756	1,213	1,125	1,040	**1,643**

* the types of report considered, and the way in which they were presented to the VPC, changed at the end of 2003.

MEMBERSHIP OF THE VPC SUB GROUP ON THE REVIEW OF DISTRIBUTION CATEGORIES OF AUTHORISED VETERINARY MEDICINES

Dr Susan Bews BSc, MBBS, LRCP, MRCS, FFPM
Lay member

Dr Andrew Bradley MA, VetMB, DCHP, DipECBHM, PhD, MRCVS (RCVS Specialist in Cattle Health and Production)
Specialism: Large Animal Vet

Dr Paul Brantom BSc, PhD, MIBiol
Specialism: Risk Analysis

[2] **Professor Michael Day BSc, BVMS (Hons), PhD, DSc, DiplECVP, FASM, FRCPath, FRCVS**
Specialism: Veterinary Immunology

Dr Steven Kayne BSc (Pharm), PhD, MBA, LLM, MSc (Med Sci), DAgVetPharm, FRPharmS, FCPP, FIPharmM, FFHom, MPS (NZ) FNZCP
Specialism: Pharmacy

[1] **Mr Fred McKeating BVMS, FRCVS**
Specialism: Mixed/Companion Animal Veterinary Practice

[1] Re-appointed to the VPC 1 January 2008
[2] VPC Term of office ended 31 December 2007

SECTION 3

THE APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES

ANNUAL REPORT 2007

THE APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES

BACKGROUND

The Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines (Appraisal Panel) was established under the aegis of the Veterinary Products Committee (VPC) in 1991 and comprised officials from relevant government departments.

However, in November 1995, the House of Commons' Agriculture Committee, in its report on the Veterinary Medicines Directorate (VMD), recommended that the Appraisal Panel should have an independent Chairman and, in May 1996, Dr Chris Powell, a member of the VPC, was appointed. At the same time, the Appraisal Panel became a formal sub-committee of the VPC.

TERMS OF REFERENCE

The Appraisal Panel's terms of reference are to:

evaluate all suspected adverse reactions to veterinary medicinal products in humans to:

identify any trends and signals of emergent problems,

generate hypotheses as to possible causes of these trends;

monitor the consequences of recommendations for changes in working practices or use;

report its findings to the VPC; and

produce an Annual Report of its findings.

THE ROLE OF THE APPRAISAL PANEL

The Appraisal Panel plays a key role in identifying trends or signals of emergent problems, monitors the consequences of recommendations for changes in working practices or use and considers reports of human suspected adverse reactions (SARs) to veterinary medicines received by the VMD under the Suspected Adverse Reaction Surveillance Scheme (SARSS). An explanation of the SARSS and a copy of the forms for reporting SARs are given at **Annex G** and **H** respectively.

Whenever possible, a report to the Appraisal Panel will include further information obtained from the reporter of the SAR. The key information required, as suggested by the Appraisal Panel, is outlined at **Annex I**. The VMD obtains follow-up information on individual cases by questionnaire, letter, and telephone.

The Appraisal Panel considers all serious human SARs. A human SAR is considered serious if it involves one or more of the following:

the death of a person exposed to a veterinary medicine,

a person having in-patient hospital care as a result of exposure to an animal medicine,

hospital out-patient care if it involves significant medical intervention (such as in the treatment of injection site injuries from vaccines containing mineral-oil adjuvants),

persistent or irreversible symptoms.

The Appraisal Panel does not attribute causality in individual cases but collectively assesses reports in relation to the type of veterinary medicine and circumstances of use. However, in identifying trends it is sometimes necessary to establish the significance of a SAR and/or validate the data. In such cases the Appraisal Panel may undertake individual case assessment to assist in identifying trends and to generate hypotheses as to the possible causes of these trends.

To achieve its remit, the Appraisal Panel evaluates all human SARs. However, to increase the objectivity and the reliability of these reports, medical practitioners' participation in the scheme is encouraged. The Guidelines for the assessment of human SARs are given at **Annex J**.

The consideration of SAR reports by the Appraisal Panel are prioritised as follows:

all serious suspected adverse reactions,

reports involving new products with new active substance/formulation or as requested by the VPC,

reports involving all other products with species, routes or dosage forms new to veterinary medicines,

reports for products or active substances that have increased by a significant factor over the previous year,

reports following a change in work practices or use,

all other reports.

The Appraisal Panel establishes its work programme at the first meeting of the year, and reviews it from time to time. To assist the Appraisal Panel in setting priorities in its work programme, the VMD maintains a list of SARs to products by active substances.

To assist the Appraisal Panel in accomplishing its task, the VMD prepares a report before each meeting. In order to facilitate the evaluation process, SAR reports are grouped within each priority category. For example, all SAR reports for which medical reports have been received are grouped together, as are SAR reports that provided detailed information on exposure and control measures including protective clothing. The assessment report and copies of all the SAR reports received by the VMD during the period concerned are circulated to the Appraisal Panel members prior to the meeting.

THE APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES ANNUAL REPORT 2007

CHAIRMAN'S INTRODUCTION

Welcome to the annual report 2007 of the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines (Appraisal Panel).

The Appraisal Panel reviews the individual reports of all suspected adverse reactions (SARs) classified as 'serious'. We met three times during 2007 and assessed seven reports of SARs requiring in- or out-patient care.

In 2007, and for the first time, the Appraisal Panel considered separately SARs relating to newly authorised products and over the course of the three meetings we considered 15 reports involving six different products. We found this to be an extremely useful exercise and have agreed to consider all reports involving those products which have been on the market for up to two years.

We continued to review groups of SARs by symptom and type of product involved and, in the majority of cases, concluded that no further action was required. In our review of SARs involving a vaccine authorised for use in sheep we were concerned about the lack of information in the reports. We also recognised that many needlestick injuries occurred because older farmers have had little training in injection techniques.

The apparent under-reporting of SARs continues to be of great concern to us and we will continue to consider ways in which the levels of reporting can be improved.

This was my final year as Chairman of the Appraisal Panel as I retired from the VPC at the end of 2007, although I shall be staying on as a member of the Panel. I would like to thank all my colleagues and officials from the VMD and other government departments for their advice and support over the last four years and to welcome my successor, Professor Bill Reilly, to the Chair.

Dr John Thompson MB ChB, BMedSci, FRCP
Chairman

THE APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES ANNUAL REPORT 2007

APPOINTMENTS, RE-APPOINTMENTS, RETIREMENTS AND RESIGNATIONS

In August the Department for Environment, Food and Rural Affairs (Defra) announced the appointment of Professor Tim Marrs OBE to serve on the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines (Appraisal Panel) with effect from January 2008. Mr Francis Anthony, Dr Finlay Dick, Dr Michael Donaghy and Dr John Thompson were re-appointed from January 2008 for a further four years.

Dr Thompson, who retired from the Veterinary Products Committee (VPC) at the end of 2007 relinquished the Chair of the Appraisal Panel but continues in his former role as the Appraisal Panel's Clinical Toxicology specialist.

Professor David Ray retired from the Appraisal Panel in December. Professor Ray was first appointed a member of the Appraisal Panel in January 1998 and had been the Chairman from April 2000 until December 2003. He had served on the VPC from January 2000 until December 2003 and had been a member of the Working Group on the Review of the Suspected Adverse Reactions Surveillance Scheme (September 2001 – October 2004). The Chairman thanked him for his valuable contribution to the work of the Appraisal Panel and particularly for the support he'd given after relinquishing the Chair.

Dr Seamus O'Reilly tendered his resignation in November because of increasing workloads. The Chairman thanked him for his contribution to the work of the Appraisal Panel. As Dr O'Reilly had been re-appointed for a further four years with effect from January, the vacancy will be carried forward until the next round of appointments begins in the autumn of 2008.

A list of members is provided at **Appendix V** and brief biographical details are available free of charge from the Committee Support Team and on the VPC website.

MEETINGS

The Appraisal Panel held meetings in March, July and November at the Veterinary Medicines Directorate (VMD).

ASSESSMENT OF SERIOUS SUSPECTED ADVERSE REACTIONS (SARS)

Although the number of reports of SARs, and particularly non-serious SARs, received in 2007, increased, under-reporting continued to give the Appraisal Panel concern.

The Appraisal Panel considered seven reports of serious SARs, five of which required in-patient hospital care, and two required hospital out-patient care. There were no reports of SARs resulting in the death of a person or causing persistent or irreversible symptoms.

The five reports of SARs requiring hospital in-treatment involved:

> accidental self-injection of an injectable product for use in cattle. Further information was not available as the hospital had not been given authorisation to release records.

The Appraisal Panel considered that it would have been helpful to know what the animals were being treated for, whether multiple use needles were used and the bacteriology of the lesion;

accidental self-injection of a mineral oil based vaccine authorised under the European centralised procedures and with the approved warnings. No further action was required;

accidental self-injection of a mineral oil based vaccine. The patient had made a full recovery. No further action was required;

accidental self-injection of a product for use in cattle. The Appraisal Panel was unsure about the product being used as the patient had referred to two other, unreported, incidents of accidental self-injection whilst treating cattle, and agreed that it would reconsider the report when further information had been obtained;

miscarriage where the user had accidentally been topically exposed to a product intended for use in bitches. As it had not been possible to obtain further information in time for the meeting in November it was agreed to reconsider at the next meeting.

The two reports of SARs requiring out-patient treatment involved:

accidental ingestion of an antibiotic for use in cattle and sheep. The Appraisal Panel considered that the symptoms could have been caused initially by the pharmacology of the active substance followed by hyperventilation caused by anxiety, but needed further information for clarity. With the patient's permission the Appraisal Panel reviewed ECG results and concluded that no further action was required;

accidental inhalation of a spot-on product for use on dogs, involving headaches, burning sensation to the lips, tongue, mouth and throat. The Appraisal Panel considered that a reaction of the duration reported in this case was unlikely to have been related to the product, although it was plausible at the time of contact, and concluded that no further action was required.

Follow-up of serious SARs

The Appraisal Panel considered follow-up action in respect of two serious SARs first considered in 2006. One related to a product for use in sows for the synchronisation of oestrus and improvement of the farrowing rate. The Appraisal Panel examined the container and packaging of the product and criticised the failure to display significant user safety warnings on the outer packaging. It recommended that these warnings should be displayed more appropriately on all packaging. The VMD agreed to review the user risk assessment data.

The second concerned an anthelmintic for use in sheep. The Appraisal Panel concluded that the SAR was unlikely to be product related.

REPORTS OF SARS TO NEWLY AUTHORISED PRODUCTS

The Appraisal Panel considered 15 reports of SARs to newly authorised products. They comprised:

a report of an eye injury which occurred whilst administering a product for use in horses and ponies. The Appraisal Panel considered that, as this was a viscous product, a pressure build up in the syringe may have been a contributing factor. It was agreed that although the symptoms were consistent with the operator warnings and that the prevention advice given was adequate, user safety warnings should be added to all future viscous products of this kind to recommend that the syringe plunger should be pushed slowly. It was agreed that the VMD would in future look in more detail at the operator warnings for similar products and that a letter would be written to the veterinary press to raise awareness of this issue;

two reports of accidental self-injection, one to an injectable solution for use in cattle, the other to a product for use in dogs for the prevention and treatment of sickness. In both cases the Appraisal Panel concluded that as a localised reaction was to be expected, no further action was required;

a report relating to a swollen hand following the use of a spray for the prevention of superficial infections in wounds in cattle. The Panel concluded that no further action was required;

four reports relating to a spot-on product to treat fleas in cats and seven to a spot-on product to treat fleas and ticks in dogs. The reported reactions included dizziness, headaches and nausea. The product for use in dogs to treat fleas and ticks had been authorised under the European Centralised procedure and carried comprehensive warnings. The Panel agreed to keep a watching brief on both of these products.

At its meeting in November the Appraisal Panel agreed that it would continue to monitor all new products for two years from the time the Marketing Authorisation (MA) was first issued.

OTHER ISSUES

Non-serious SARs

At the request of a member, the Panel considered a report of a non-serious SAR relating to the inhalation of a product used in sedating horses and zoo animals and concluded that the transient symptoms were plausible and that no further action was required.

Digit amputation

In November 2006, the Appraisal Panel had reviewed reports of SARs involving digit amputation and concluded that further information on the medical management of these reactions was required. In March it noted the results of a literature search of digit amputation and considered changes to the operator warnings on the label of the relevant product that had been suggested by a consultant hand surgeon. The Appraisal Panel accepted these suggestions and made further recommendations for consideration by VMD officials.

At its meeting in July, the Appraisal Panel was informed that officials had sought the

surgeon's advice on the latest European Union (EU) agreed user safety warnings for this type of product. The surgeon had suggested a minor change which officials agreed to propose when the guidelines were next reviewed.

Operator warnings for a vaccine for use in horses
At its meeting in November 2006, the Appraisal Panel recommended that improvements needed to be made to the operator warnings for a vaccine for use in horses and referred the matter to the VPC. The VPC was consulted in January and endorsed the Appraisal Panel's opinion. The Appraisal Panel and the VMD agreed to monitor reports of adverse reactions to the product when the new operator warnings had been put in place.

SARs involving neurological disorders excluding those associated with the use of sheep dips
The Appraisal Panel discussed these reports and identified cases involving two products which it agreed to review, together with their packaging, at a future meeting.

The Appraisal Panel identified reports concerning a vaccine and agreed to review them in more detail at a future meeting, with particular regard to the persistence of symptoms over prolonged periods.

The Appraisal Panel was reassured by the low number of reports involving neurological disorders and that few cases involved primary neurological dysfunction. The Appraisal Panel concluded that liquid preparations were more likely to cause adverse reactions than other formulations.

SARs involving neurological disorders associated with the use of sheep dips
The Appraisal Panel had reviewed many of these cases in the past and agreed to concentrate on cases involving non-organophosphate (OP) dips and the symptoms of 'sheep dipper's flu' (see 'Symptom and product groups' below).

The Appraisal Panel asked for a sales data report which investigated the patterns of adverse reactions in relation to sales volumes and charted the impact of significant changes e.g. the introduction of a certificate of competence for the purchaser of OP dips, the cessation of compulsory dipping, and the suspension of the MAs for cypermethrin-based products (see 'Symptom and product groups' below).

Symptom and product groups
The Appraisal Panel has reviewed SARs by symptom and product group this year. Details are given in **Appendix VI**.

SARs involving bronchial and lung disorders
A summary of 86 reports, covering the period 1991 – 2006, associated with bronchial and lung disorders was considered. The Appraisal Panel discussed at length the 35 reports relating to two products for use in cats and two similar products for use in dogs. It noted that the incidence of reporting had reduced since the product had become available as a spot-on rather than a spray. It was agreed that it would be useful to receive a report of all reports received of SARs to these products, comparing the number relating to spot-ons to sprays. No further action was required for the remainder of the reports considered.

SARs involving 'sheep dipper's flu' or chronic signs associated with non-OP dips
The Appraisal Panel considered four reports and concluded that no further action was required.

SARs involving tablets for use in cats and dogs
The Appraisal Panel considered three reports of SARs involving tablets for use in cats and dogs, in which the animal medicine had been mistaken for the owner's medicine. After reviewing the packaging provided by the MA holder, it concluded that no further action was required.

SARs involving a vaccine for use in sheep
The Appraisal Panel considered a report of 216 reports received during the period 1991 – 2007. One report received earlier this year related to an incident occurring in 1983 and it was concluded that the reaction was unlikely to be product related.

The Appraisal Panel recognised that many of the needlestick injuries occurred because, traditionally, farmers have had little training in injection techniques. It was expected that the situation would improve as training became more widely accepted, particularly among the new generation of farmers.

Most of the reactions were local, but the Appraisal Panel was concerned about the lack of information in the reports, particularly in respect of duration and morbidity.

The Appraisal Panel was informed that the information to be provided by MA holders was specified in the relevant EU guidelines. Details such as the time to onset and the duration of reactions were frequently not reported.

Evaluation of SARs to sheep dips remaining on the market in relation to external factors
The Appraisal Panel considered a summary of SARs reports received relating to currently authorised OP and synthetic pyrethroid (SP) dips. The report also highlighted major events relating to the use of dips from 1984 to date. The overall number of reports had fallen in recent years, possibly as a result of more dipping being undertaken by contractors rather than individual farmers.

In recent years more reports had been received relating to the use of SP dips and it was considered that this might be a result of the introduction of the closed transfer systems for OP dips in 2001.

OP sheep dips sales
The Appraisal Panel considered a report of sales from 2002 to 2006.

ACKNOWLEDGEMENTS
The Appraisal Panel is grateful for the advice it received from officials of the Central Science Laboratory, Defra, the Department of Health, the Health Protection Agency, the Environment Agency, the Health and Safety Executive and the Scottish Environment Protection Agency. It also thanks VMD officials and the members of the Committee Support Team for their continuing support and assistance during the year.

MEMBERSHIP OF THE APPRAISAL PANEL

CHAIRMAN

[1] **Dr John Thompson MB ChB, BMedSci, FRCP**
Specialism: Clinical Toxicology

MEMBERS

Mr Francis Anthony BVMS, MRCVS
Specialism: Veterinary Medicine

[2, 3] **Dr Finlay Dick MD, MRCGP, MFOM**
Specialism: Occupational Hygiene

Dr Michael Donaghy DPhil (Oxon), FRCP (Lond)
Specialism: Neurology

[4] **Dr Seamus O'Reilly MB BCh, BAO, DRCOG, MRCGP, MRCPI, FRCS (AE)Ed, FFAEM, CCST**
Specialism: Accident and Emergency Medicine

Dr Andrew Povey BSc, MSc, PhD
Specialism: Epidemiology

[5] **Professor David Ray BSc, PhD**
Specialism: Toxicology

Dr Michael Tidman MD, FRCP (Edin)
Specialism: Dermatology

Dr Rosemary Waring DSc, FRCPath, PhD, BA
Specialism: Pharmacology/Toxicology/Pathology

[1] Relinquished Chair on 31 December 2007; continues to serve as a member until 31 December 2011
[2] MSP member
[3] Re-appointed 1 January 2008 – 31 December 2011
[4] Resigned November 2007
[5] Term of office ended 31 December 2007

GROUPS OF SUSPECTED ADVERSE REACTIONS CONSIDERED BY THE APPRAISAL PANEL

Year of Review	Product/Symptom Groups
1991/2	Ectoparasiticides: Organophosphate (OP) sheep dips.
1993	Ectoparasiticides: OP sheep dips, ectoparasiticide spray and pour-on products, live vaccine.
1994	Ectoparasiticides: OP sheep dips, non-OP sheep dips, spot-on products, flea collars, mineral oil-based vaccines.
1995	Ectoparasiticides: OP sheep dips, non-OP sheep dips, pour-on and spot-on products.
1996	Anaesthetics and neurological agents, anthelmintics, ectoparasiticides: OP sheep dips, non-OP sheep dips, shampoos, powders, sponge-ons, sprays and spot-on products, growth promoters and inactivated vaccines.
1997	Antimicrobials, ectoparasiticides: OP sheep dips, non-OP (synthetic pyrethroid (SP)) sheep dips, sprays, spot-on products (SP and OP) and flea collars; endectocides, live vaccines, anaesthetics and neurological agents, anthelmintics, anti-fungals, antiseptics, anti-inflammatories, foot preparations, growth promoters, hormones and minerals.
1998	Anthelmintics, ectoparasiticides: non-OP (SP) sheep dips and pour-on products, spot-on and spray products containing fipronil.
1999	Ectoparasiticides: OP sheep dips, OP pour-on products, spot-on products containing fipronil, OP flea collars containing diazinon, products containing amitraz.
2000	Ectoparasiticides: OP sheep dips, SP sheep dips, OP pour-ons, inactivated clostridial vaccines.
2001	Ectoparasiticides: OP sheep dips, spot-on products containing imidacloprid, sprays containing dichlorvos, pour-on products.
2002	Ectoparasiticides: a variety of products, excluding sheep dips, vaccines: live and inactivated.
2003	Anthelmintics, endectocides (including spot-on, pour-on, injectable and oral drench products), neurological agents (anaesthetics, sedatives, euthanasia agents, analgesics, muscle relaxants), vitamins and minerals, and antimycotics (dermal preparations).

Year of Review	Product/Symptom Groups
2006	Digit amputation.
2006	Eye SARs associated with splashing of product.
2007	Bronchial and lung disorders.
2007	'Sheep dipper's flu' or chronic signs associated with non-OP dips.
2007	Tablets for use in cats and dogs.
2007	A vaccine for use in sheep.
2007	Dips remaining on the market in relation to external factors.

SECTION 4

MEDICAL AND SCIENTIFIC PANEL

ANNUAL REPORT 2007

MEDICAL AND SCIENTIFIC PANEL

BACKGROUND

In 1994 the Veterinary Products Committee (VPC) recommended that a sub-committee, comprising medical and scientific experts, should be established to evaluate and co-ordinate research on organophosphate (OP) sheep dips in relation to possible human exposure.

TERMS OF REFERENCE

The MSP's terms of reference are to:

evaluate research currently available, and in progress, on OP sheep dip products in relation to possible human exposure;

advise on any additional work that may be needed to elucidate the potential long-term effects on humans of OP sheep dip;

advise on the suitability of any projects submitted for research; and

report its findings to the VPC, as its sub-committee.

THE ROLE OF THE MSP

In order to meet its terms of reference, MSP members are invited to review, between meetings, abstracts of scientific research papers relevant to human exposure to OP sheep dips to identify those worthy of further consideration.

They then review the relevant research paper and, if it is considered to be of interest to the MSP as a whole it will be included on the agenda for the next meeting for further discussion.

In 2005 the MSP agreed to provide advice to the Veterinary Medicines Directorate on proposals for research, which had been received by the Department for Environment, Food and Rural Affairs.

MEDICAL AND SCIENTIFIC PANEL ANNUAL REPORT 2007

CHAIRMAN'S INTRODUCTION

Welcome to the MSP Annual Report 2007.

We held two regular meetings in 2007 at the Veterinary Medicines Directorate (VMD) and reviewed 40 papers of possible relevance to organophosphates and human health. We also received updates on a series of studies being conducted in this area.

We were also very grateful to Professor David Ray, University of Nottingham, who attended the April meeting and gave a most informative presentation on the published works of Slotkin et al relating to the comparative developmental neurotoxicity of OP insecticides.

The MSP looks forward to being of further help to the VMD in the future.

Professor Len Levy OBE, BSc, MSc, PhD, FFOM, FBTS
Chairman

THE MEDICAL AND SCIENTIFIC PANEL ANNUAL REPORT 2007

APPOINTMENTS AND RE-APPOINTMENTS

In August the Department for Environment, Food and Rural Affairs (Defra) announced the appointment of Professor Tim Marrs OBE to serve on the Medical and Scientific Panel (MSP) with effect from January 2008. Dr Anne Spurgeon was re-appointed from January 2008 for a further four years.

MEETINGS

The MSP held meetings in April and November at the Veterinary Medicines Directorate (VMD).

ISSUES CONSIDERED BY THE MSP

Scientific papers

The MSP received abstracts of 522 scientific papers relating to organophosphates (OPs), of which 48 were considered by members to be of potential interest to the MSP. The full papers for these were reviewed by individual members who considered that 40 would be of interest and relevant to the MSP.

The MSP considered 25 of the papers at its meeting in April and the remaining 15 in November. The MSP concluded that, although some of the papers evaluated were interesting, none of them provided new evidence of a link between low-level exposure to OPs and health effects.

Current dipping products

In 2006 the MSP had asked for information on current sheep dipping products and methods of administration. At its meeting in March it considered a report providing a concise overview and asked for this to be updated periodically and presented to the MSP for information.

Defra project VM02302 (A case controlled study of neuropsychological and psychiatric functioning in sheep farmers exposed to organophosphate pesticides)

The MSP considered a report of developments on this study since it had met with the study investigators and prepared their opinion on the study in September 2006.

The MSP reaffirmed its previous opinion about shortcomings in the study design and was not convinced that these concerns had been adequately addressed in the responses from the contractor.

Sarah Mackenzie Ross article on cognitive impairment following exposure to OP pesticides: a pilot study

The MSP considered this article published in the Journal of Occupational Health and Safety – Australia and New Zealand 2007, 23(2): 133-142 and concluded that this was a report on a small scale of self-selected subjects which merely confirmed their suspected illnesses and did not address exposure.

Defra project VM0299 (Survey of health complaints among sheep dippers)
The MSP was informed that the final report should complete the peer review process by the end of 2007 and, following that, the report would be circulated to the MSP.

Defra project VM02115 (Disabling neuropsychiatric disease in farmers exposed to organophosphates): an update
VMD officials gave a verbal update on the progress of this study. The MSP was informed that the report had recently been received, and was currently under review, by the VMD. The MSP would be asked to comment on the study in due course.

Defra project VM02300 (Effects of sheep dip pesticides on differentiating nerve cells: identification of novel markers of toxicity)
The MSP was asked to evaluate this Defra project but considered that it did not have the relevant expertise to fully evaluate the significance of its findings.

Summary of projects in the Food Standards Agency (FSA) programme T10 – mixtures toxicology and exposure
The MSP considered this programme of work by the FSA and concluded that some of the topics may be of relevance to the research interests of the VMD. It was suggested that the VMD and the FSA might wish to discuss the contents of this programme further.

Presentation on the comparative developmental neurotoxicity of OP insecticides
The Chairman welcomed Professor David Ray, University of Nottingham and member of the VPC sub-committee, the Appraisal Panel for Human Suspected Adverse Reactions, who had been invited to give a presentation of the published works of Slotkin et al relating to the comparative developmental neurotoxicity of OP insecticides.

The presentation, which was very well received, prompted much discussion between members and Professor Ray, which continued after the meeting by correspondence.

ACKNOWLEDGEMENTS
The MSP is grateful for the advice it received from officials of the Health Protection Agency, the Health and Safety Executive and Defra. It also thanks VMD officials and the members of the Committee Support Team for their continuing support and assistance during the year.

MEMBERSHIP OF THE MEDICAL & SCIENTIFIC PANEL

CHAIRMAN

[1] **Professor Len Levy OBE, BSc, MSc, PhD, FFOM, FBTS**
Specialism: Toxicology

MEMBERS

[1] **Dr Sarah Cockbill LLM, BPharm, MPharm, PhD, DAgVetPharm, MIPharmM, FRPharmS, FCPP**
Specialism: Pharmacy

[2] **Dr Finlay Dick MD, MRCGP, MFOM**
Specialism: Occupational Hygiene

Dr Peter Fawcett BSc, MBBS, MRCP, FRCP
Specialism: Neurophysiology

Dr Lars Jarup MSc, MD, PhD, FFPHM
Specialism: Public Health Epidemiology

Dr Richard Knight BA, BM BCh, MRCP, FRCP (E)
Specialism: Neurology

[3] **Dr Anne Spurgeon BSc (Hons), PhD, MBPS, Chartered Psychologist**
Specialism: Neurobehavioural Toxicology/Clinical Psychology

[1] VPC member
[2] Appraisal Panel member
[3] Re-appointed 1 January 2008

SECTION 5

ANNEXES

DECLARATION OF INTERESTS: A CODE OF PRACTICE FOR MEMBERS OF THE VETERINARY PRODUCTS COMMITTEE AND ITS SUB-COMMITTEES

1. CONFLICTS OF INTEREST

1.1. The Chairman and members of the Veterinary Products Committee (VPC) and its sub-committees shall comply with the following Code of Practice as to the circumstances in which they should declare an interest in the pharmaceutical industry.

1.2. The advice of the VPC concerns matters which are connected with the pharmaceutical industry and it is therefore desirable that members should have a good understanding of the work of the industry. It is also desirable that some members should have practical experience of the scientific problems of product development. The pharmaceutical industry relies heavily on the advice of doctors, veterinarians and pharmacists outside the industry in, for example, the universities. To avoid any public concern that commercial interests might affect the advice of the VPC, Ministers have decided that the arrangements which govern relationships between members and the pharmaceutical industry and information on significant and relevant interests should be on public record.

1.3. In this Code of Practice 'pharmaceuticals industry' means:

a) companies, partnerships or individuals who are involved with the manufacture, sale or supply of veterinary medicinal products (including veterinary homeopathic products) subject to Directive 2001/82/EEC on the Community code relating to Veterinary Medicinal Products (O.J. No L 311 of 28.11.2001) and the Veterinary Medicines Regulations 2007 S.I. 2007 No 2539;

b) trade associations representing companies involved with such products;

c) companies, partnerships or individuals who are directly concerned with research, development or marketing of a veterinary medicinal product (including a veterinary homeopathic product) which is being considered by the VPC or sub-committees.

References to the pharmaceutical industry include cases involving a single company.

1.4. In this Code of Practice 'the CST' means the Committee Support Team of the VPC.

Different Types of Interest

1.5. The following is intended as a guide to the kinds of interests which should be declared. Where a member is uncertain as to whether an interest should be declared he/she should seek guidance from the CST or, where it may concern a particular product which is to be considered at a meeting, from the Chairman at that meeting. If a member has an interest not specified in these notes but which he believes could be regarded as influencing his advice he should declare it. However, neither the member nor the CST is under an obligation to search out links between one company and another, for example where a company with which the member is

connected has an interest in a pharmaceutical company of which the member is not aware and could not reasonably be expected to be aware.

Personal Interests

1.6. A personal interest involves payment to the member personally. The main examples are:

a) Consultancies: any consultancy, directorship, position in or work for the pharmaceutical industry, which attracts regular or occasional payments in cash or kind.

b) Fee-Paid Work: any work commissioned by the pharmaceutical industry for which the member is paid in cash or kind.

c) Shareholdings: any shareholding in or other beneficial interest in shares of the pharmaceutical industry. This does not include shareholdings through unit trusts or similar arrangements where the ember has no influence on financial management.

Non-personal Interests

1.7. A non-personal interest involves payment which benefits a department for which a member is responsible, but is not received by the member personally. The main examples are:

a) Fellowships: the holding of a fellowship endowed by the pharmaceutical industry.

b) Support by the pharmaceutical Industry: any payment, other support or sponsorship by the pharmaceutical industry which does not convey any pecuniary or material benefit to a member personally but which does benefit his position or department e.g.:

i) a grant from a company for the running of a unit or department for which a member is responsible;

ii) a grant or fellowship or other payment to sponsor a post or a member of staff in the unit for which a member is responsible. This does not include financial assistance for students;

iii) the commissioning of research or other work by, or advice from, staff who work in a unit for which a member is responsible.

1.7.1. Members are under no obligation to seek out knowledge of work done for or on behalf of the pharmaceutical industry in departments for which they are responsible if they would not normally expect to be informed.

Additional Guidance for Members of the Medical and Scientific Panel

1.8. Members of the Medical and Scientific Panel (MSP) are also required to comply with the following paragraphs, which were adopted in January 1997. In case of any conflict between the provisions of the following paragraphs and paragraphs 1.1 to 1.5 above, these shall apply.

1.9. Members of the MSP should, at the next meeting of the MSP following the commencement of involvement in question, declare that they have become involved in court proceedings relating to human health aspects of exposure to organophosphorus (OP) sheep dips. If no meeting of the MSP is to take place within one month of the commencement of the involvement, the member should make such a declaration directly to the Chairman. 'Involvement' in court proceedings would include providing or agreeing to provide expert advice in connection with OP sheep dips to a party to existing or proposed court proceedings, and agreeing to appear as a witness in court in the case.

1.10. The requirement to make a declaration under paragraph 1.9 shall be subject to the general rules of medical confidentiality relating to particular individuals.

1.11. After giving a declaration under paragraph 1.9 above, the member concerned shall declare at any future meeting of the MSP, and, as appropriate, at any time to the Chairman as set out in that paragraph, any changes in his/her involvement, such as whether agreement has been given to act as a witness following the giving of advice.

1.12. Much of the information considered by the MSP is considered to be 'commercially confidential' and should not be divulged to anyone outside the Committee. Members are therefore required to keep confidential the MSP's discussions or proposed advice to the Veterinary Products Committee.

1.13. Members may receive requests for information under the Freedom of Information Act (FoI), which presumes that requests will be granted. However, there are exemptions for specific types of information including commercial interests and trade secrets but, before an exemption can be enacted, a 'public interest' test must be applied.

1.14. This may create a conflict if a member is involved in court proceedings in relation to the duty of disclosure to the court. In such cases, the member should first consult the MSP Chairman who should seek advice from the VMD with the objective of obtaining consent to disclose the information, deliberations or advice in question.

1.15. Other than as provided above, members of the MSP shall declare in the same way as described in paragraph 1.9 above, any occasions when they have agreed to conduct research, in return for payment, connected with OP sheep dips.

1.16. If the circumstances arise in which, in the opinion of the Chairman, a declaration by a member of the Panel not otherwise provided for by this code or the General Code of Practice is necessary in order to ensure the proper conduct of the MSP, the Chairman, may require a member of the MSP to make such a declaration, and he may then give directions in accordance with paragraph 1.5 above.

2. DECLARATION OF INTERESTS

Declaration of Interests to the CST

2.1. Members of the VPC and sub-committees should inform the CST in writing when they are appointed of their current personal and non-personal interests. Only the name of the company and the nature of the interest are required; the amount of any salary, fees, shareholding etc. need not be disclosed to the CST. An interest is

current if the member has an on-going financial involvement with the pharmaceutical industry, e.g. if he/she holds shares in a pharmaceutical company, if he/she has a consultancy contract with the pharmaceutical industry, or if he/she is in the process of carrying out work for the pharmaceutical industry.

2.2. Members are asked to inform the CST at the time of any change in their personal interests, and will be invited to complete a declaration form annually.

2.3. Non-personal interests involving less than £1,000 from a particular company in the previous year need not be declared to the CST.

Special Position of the Chairman

2.4. It is not appropriate for the Chairman of the VPC to have any current personal interests in the pharmaceutical industry. The position of sub-committee Chairmen is the same as for all other members, since sub-committees report to the VPC rather than giving advice in their own right.

Declaration of Interests at Meetings and Participation by Members

2.5. Members are required to declare relevant interests at VPC or sub-committee meetings and to state whether they are personal or non-personal interests and whether they are specific to the product under consideration or non-specific.

2.5.1. A member must declare a personal specific interest if he/she has at any time worked on the product under consideration and has personally received payment for that work, in any form, from the pharmaceutical industry. The member shall take no part in the proceedings as they relate to the product, except that he/she may at the Chairman's request answer questions from other members. (The accepted VPC practice is that the member(s) will be asked to leave the room for the duration of the discussion.) If the interest is no longer current, the member should declare it as a lapsed personal specific interest.

2.5.2. A member must declare a personal non-specific interest if he/she has a current personal interest in the pharmaceutical company concerned which does not relate specifically to the product under discussion. The member shall take no part in the proceedings as they relate to the product, except that he/she may at the Chairman's discretion answer questions from other members.

2.5.3. A member must declare a non-personal specific interest if he/she is aware that the department for which he/she is responsible has at any time worked on the product but the member has not personally received payment in any form from the pharmaceutical industry for the work done. The member may take part in the proceedings unless he/she has personal knowledge of the product through direct supervision of other people's work, in which case he/she should declare this and not take part in the proceedings (except to answer questions).

2.5.4. There is no need for members to declare non-personal non-specific interests (i.e. if a member is aware that the department for which he/she is responsible is currently receiving payment from the pharmaceutical company concerned

which does not relate specifically to the product under discussion). If, exceptionally, a member feels such an interest might be thought to influence his advice, he/she should seek guidance from the Chairman on whether to draw the facts to the attention of other members. (The accepted VPC practice is that members do declare any relevant non-personal non-specific interests.)

2.6. The examples of 'personal', 'non-personal' and 'current' interests given in the previous paragraphs should be read in the context of paragraphs 1.6 and 1.7. 'Taking part in the proceedings' includes both speaking and voting. A member who is in any doubt as to whether he/she has an interest which should be declared, or whether he/she should take part in the proceedings, should ask the Chairman for guidance. The Chairman has the power to determine whether or not a member with an interest shall take part in the proceedings.

2.7. If a member is aware that a product under consideration is, or may become, a competitor of a product manufactured, sold or supplied by a company in which the member has a current personal interest, he/she should declare the interest in the company marketing the rival product. The member should seek the Chairman's guidance on whether he/she should take part in the proceedings.

Record of Interests

2.8. A record is kept in the CST of:

a) Names of members who have declared interests to the CST on appointment, as the interest first arises, or through the annual declaration, and the nature of the interest, and

b) Names of members who have declared interests at meetings, giving dates, names of relevant products and companies, details of the interest declared and whether the member took part in the proceedings.

Publication of Interests

2.9. Information about interests declared by members to the CST at will also be published each year with the annual report.

DECLARATION OF INTERESTS DURING THE MEETING AND IMPLICATIONS

NATURE OF INTEREST	DESCRIPTION	INVOLVEMENT IN DISCUSSION
Personal Specific	Member has at any time worked on the product under consideration and has personally received payment for that work from the industry.	Should take no part in the proceedings as they relate to that product and would normally be asked to leave the room for the duration of the discussion.
Lapsed Personal Specific interest	As above but the interest is no longer current.	Can take part in proceedings.
Personal Non-Specific	Current personal interest in the pharmaceutical company concerned which does not relate specifically to the product under discussion.	Should take no part in the proceedings as they relate to that product, except at the Chairman's discretion to answer questions from other members.
Current Personal	Either in the pharmaceutical company concerned which does not relate specifically to the product under discussion ***or*** in a company marketing a rival product.	Should take no part in the proceedings as they relate to that product, except at the Chairman's discretion to answer questions from other members.
Non-Personal Specific	Member is aware that the department for which they are responsible has at any time worked on the product under discussion.	May take part in the proceedings unless they have personal knowledge of the product through their own work or the supervision of others in which case, they should take no part in the proceedings as they relate to that product, except at the Chairman's discretion to answer questions from other members.
Non-Personal, Non-Specific	Member is aware that the department for which they are responsible is currently receiving payment from the company which does not relate to the product under discussion.	May take part in the proceedings unless the Chairman rules otherwise.

MEMBERS OF THE VPC, ITS SUB-COMMITTEES AND WORKING GROUPS HAVE DECLARED THE FOLLOWING INTERESTS IN THE PHARMACEUTICAL INDUSTRY FOR 2007

VETERINARY PRODUCTS COMMITTEE

	Personal Interests			Non-Personal Interests		
Name	**Name of Company**	**Nature of interest**	**Current**	**Name of Company**	**Nature of interest**	**Current**
Mr David Skilton	None			None		
Prof Diana Anderson	None			None		
Mr David Arnold	None			None		
Prof Tar-Ching Aw	None			Pfizer Animal Health	Part sponsorship of staff position in department	Yes
Dr Susan Bews	Sanofi Aventis	Pension	Yes	None		
	Sanofi Aventis	Shares	Yes			
Dr Alistair Boxall	Ceva Sante	Consultancy	Yes	Astra Zeneca	Studentship funding	Yes
	Huvepharma	Consultancy	Yes	Hoffman La Roche	Studentship funding	Yes
Dr Andrew Bradley	Boehringer	Consultancy/ fees	Yes	Boehringer	Retrospective discounts	Yes
	Cross Vet Pharm Group	Consultancy/ fees	Yes	Elanco	Retrospective discounts	Yes
	Delaval	Consultancy/ fees	Yes	Fort Dodge	Retrospective discounts	Yes
	Intervet	Consultancy/ fees	Yes	Intervet	Retrospective discounts	Yes
	Merial	Consultancy/ fees	Yes	Merial	Retrospective discounts	Yes
	Pfizer Animal Health	Consultancy/ fees	Yes	Pfizer Animal Health	Retrospective discounts	Yes
	Schering-Plough	Consultancy/ fees	Yes	Schering-Plough	Retrospective discounts	Yes
	VetXX	Consultancy/ fees	Yes	Pfizer Animal Health	Studentship	Yes
	Quality Milk Management Ltd	Director and Shareholder	Yes			
Dr Paul Brantom	Danisco Animal Nutrition	General consultancy	Yes	None		
	Elanco Animal Health	General consultancy	Yes			
	Masterfoods/Waltham	General consultancy	Yes			

Dr Paul Brantom (cont'd)	Pfizer Animal Health	Consultancy – specific product	Yes			
Dr Sarah Cockbill	None			None		
Dr Paul Collier	DeLaval NV	Preparation of an Expert Report	Yes	None		
Mrs Rosemary Collingborn	Protherics	Shareholding	Yes	None		
Prof Barry Cookson	None			None		
Dr Susan Dawson	Bayer	Conference Attendance	Yes	Intervet	Lectureship and research grant	Yes
	Intervet	Conference attendance	Yes			
	Merial	Conference Attendance	Yes	Intervet	Research grant	Yes
				Merial	Research grant	Yes
				Novartis	Research grant	Yes
				Pfizer Animal Health	Research grant	Yes
				Schering-Plough	Research grant	Yes
				VetXX	Research grant	Yes
				Virbac	Research grant	Yes
Prof Michael Day	Bayer	Consultancy	Yes	Langford Veterinary Diagnostics	As part of his employment with the University of Bristol, Prof Day is Director of the department's diagnostic laboratories that occasionally perform ad-hoc testing or contract research for pharmaceutical companies	Yes
	IAMS	Consultancy	Yes			
	Merial	Consultancy	Yes			
	Pfizer Animal Health	Consultancy	Yes			
	Intervet	Editor for Vetstream and consultancy	Yes			
			Yes			
	KWS Biotest Ltd	Shareholder and consultant				
				Axiom Laboratories	Residency funding	Yes
				Glaxo Smith Kline	Residency funding	No
				Merial	Research funding	No
				Nestec	Research funding	No

Prof Michael Day (cont'd)				Novartis	Research funding	No
				Royal Canin	Research funding	No
				Waltham Centre for Pet Nutrition	Research funding	No
				Genetrix	Research collaboration	No
				Affinity Petcare	Research funding	Yes
				DePuy Orthopaedics	Research funding	Yes
Prof Jonathan Elliott	Idexx Laboratories	Advisory board member	Yes	Mars ltd	Research grant	Yes
	Waltham Centre for Pet Nutrition	Advisory board and consultancy	Yes	Novartis Animal Health	Research grant	Yes
				Pfizer	Research grant	Yes
	Boehringer Ingelheim	Consultancy	Yes	Waltham Centre for Pet Nutrition	Research grant	Yes
	CEVA Animal Health	Consultancy	Yes			
	Niche Generics Ltd	Consultancy	Yes			
	Novartis Animal Health	CPD lecturing	Yes			
	Pfizer Ltd	Consultancy	Yes			
	Vetoquinol	Consultancy	Yes			
	Virbac Ltd	Consultancy				
Prof John Gilleard	None			Meat and Livestock Commission	Funding	Yes
				Meat and Livestock Commission	Studentship	Yes
				Pfizer Animal Health	Research grant	Yes
				Pfizer Animal Health	Funding for conference attendance	Yes
Dr Peter Greaves	Actelion Pharmaceuticals, Switzerland	Consultancy – specific product	Yes	None		
	Astellas Pharma Europe	Consultancy- specific Product	Yes			
	Astra Zeneca	Consultancy – specific product	Yes			
	Bayer Schering Pharma AG, Berlin	Consultancy – specific product	Yes			
	Biogen Indec, Massachusetts, USA	Consultancy – specific product	Yes			

Dr Peter Greaves (cont'd)	Synosia Therapeutics Inc, California, USA	Consultancy – specific product	Yes			
	Bioniche Life Sciences Inc, Quebec	Consultancy – specific product	Yes			
	Daiichi Sankyo, Japan	Consultancy – specific product	Yes			
	Experimental Pathology Laboratories, Virginia USA	Consultancy – specific product	Yes			
	Ferring Pharmaceuticals, Copenhagen	Consultancy – specific product	Yes			
	GlaxoSmithKline RandD	Consultancy – lecture	Yes			
	Shire Pharmaceutical Development, UK	Consultancy – specific product	Yes			
	AstraZeneca	Pension	Yes			
Prof Edward Houghton	None			None		
Dr Steven Kayne	Complements of Scotland Limited	Director	Yes	None		
Prof Len Levy OBE	None			None		
Mr Stephen Lister	Elanco Animal Health	Consultancy on poultry veterinary topics	Yes	None		
	Intervet UK	Consultancy on poultry veterinary topics	Yes			
Mr Fred McKeating	Glaxo Smith Kline	Shareholding	Yes	None		
	Phytopharm	Shareholding	Yes			
Prof Stuart Reid	KMG Data Ltd	Partner is a Director	Yes	Land Catch Natural Selection	Research contract	Yes
				Moypark Ltd	Research contract	Yes
				Pet Food Manufacturers Assoc	Research contract	Yes
				Pfizer Animal Health Ltd	Research contract	Yes
				Pfizer Limited	Research contract	Yes

Prof Stuart Reid (cont'd)				Quality Meat Scotland Sygen International Ltd Hill's Pet Nutrition Ltd	Research contract Research contract Sponsored staff post	Yes Yes Yes
Prof Bill Reilly	None			None		
Prof Bertus Rima	None			None		
Dr John Thompson	None			None		
Mr John Verrall	None			None		
Mr Tony Wall	None			Alpharma Bayer Intervet Novartis Schering-Plough	Clinical trials and training Clinical trials and training Clinical trials and training Clinical trials and training Clinical trials and training	Yes Yes Yes Yes Yes
APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES						
Dr John Thompson	See entry under Veterinary Products Committee					
Mr Francis Anthony	None			None		
Dr Finlay Dick	None			Wyeth	As a member of the Translational Medicine Research Consortium, have awarded a colleague a grant.	Yes
Dr Michael Donaghy	None			None		
Seamus O'Reilly	None			None		
Dr Andrew Povey	None			European Chemical Industry Council	Research grant to study DNA damage and repair	Yes
Prof David Ray	Bayer ZBL Behring	Consultancy Consultancy	Yes Yes	None		

Dr Michael Tidman	None			None		
Dr Rosemary Waring	None			None		
		MEDICAL AND SCIENTIFIC PANEL				
Prof Len Levy OBE	See entry under Veterinary Products Committee					
Dr Sarah Cockbill	See entry under Veterinary Products Committee					
Dr Finlay Dick	None			Wyeth	As a member of the Translational Medicine Research Consortium, have awarded a colleague a grant.	Yes
Dr Peter Fawcett	ICI Astra Zeneca	Shareholding Shareholding	Yes Yes	None		
Dr Lars Jarup	None			None		
Dr Richard Knight	Baxters	Fees for lectures	Yes	None		
Dr Anne Spurgeon	None			None		

SUB-COMMITTEES AND WORKING GROUPS OF THE VPC

Since 1971 the Veterinary Products Committee (VPC) has established four sub-committees, two of which have completed their work and are no longer extant:

1971 – 1988 The Feedingstuffs Sub-Committee was established to advise on all matters referred to it by the VPC relating to the application of the Medicines Act 1968 to animal feedingstuffs. In July 1988, following a restructuring of the VPC, the sub-committee was adjourned indefinitely.

1972 – 1977 The Joint Sub-Committee on Antimicrobial Substances was established for the purpose of advising the VPC and the Committee on the Safety of Medicines on all matters relating to the use of antibiotics. The sub-committee completed its work in 1977.

1991 → **The Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines** (Appraisal Panel) was established under the aegis of the VPC in 1991 and comprised officials from relevant government departments, to evaluate all reported human reactions to veterinary medicines (Section 3 of this Report).

However, in November 1995, the House of Commons' Agriculture Committee, in its report on the Veterinary Medicines Directorate, recommended that the Appraisal Panel should have an independent Chairman and, in May 1996, Dr Chris Powell, a member of the VPC, was appointed. At the same time, the Appraisal Panel was formally established as a sub-committee of the VPC.

1994 → **The Medical and Scientific Panel** (MSP) was established to provide advice to the VPC on human health aspects of organophosphate (OP) sheep dips (Section 4 of this Report).

The VPC has also established a number of working groups to address specific issues and report their findings back to it:

1999 – 1999 The BST Working Group was established to consider papers relating to human and animal safety aspects of the use of recombinant Bovine Somatotropin, in particular those relating to the possible effects of IGF-1, published since 1993. **Report** and **Government response** **published 1999**.

1999 – 1999 The Sub-Group on Hormonal Growth Promoters was established to complete a balanced and critical evaluation of the scientific reasoning and methods of argument adopted in a report of the European Union's (EU's) Scientific Committee on Veterinary measures relating to Public Health (SCVPH) on the European Community ban on the use of growth hormones and the importation of meat from treated cattle. **Report** **published 1999**.

1999 – 2002 The Working Group on Feline and Canine Vaccination was established to review post vaccination reactions in dogs and cats. **Report published 2002**.

2000 – 2001 The Working Group on Antimicrobial Resistance was established to consider the safety and efficacy requirements for authorising antimicrobials in order to minimise the development of antimicrobial resistance and to provide guidance for industry. **Report published 2003**.

2001 – 2004 The Working Group on the Review of the Suspected Adverse Reaction Surveillance Scheme (SARSS) was established to review the VMD's SARSS and make recommendations on how it could be improved in respect of animal and human Suspected Adverse Reactions (SARs) and environmental incidents involving veterinary medicines, and the resources needed. **Report published 2003**.

2002 – 2006 The Working Group on the Review of Hormones was established to consider the latest opinion of the SCVPH on the potential risk to human health from hormone residues in bovine meat and meat products. **Report published 2006**.

2006 → **The Sub Group on the Review of the Distribution Categories of Authorised Veterinary Medicinal Products** was established following the Government's acceptance of recommendations in the reports by the Independent Review of Dispensing by Veterinary Surgeons of Prescription Only Medicines (**the Marsh Report**) and the **Competition Commission**, to assist VMD officials in their consideration of the proposed changes.

VETERINARY PRODUCTS COMMITTEE PUBLICATIONS

All reports and summary minutes are available free of charge from the Committee Support Team.

Some of the following documents are saved in Portable Document Format (). To read them you will first need a copy of Adobe Acrobat Reader which is available free of charge. Click here to download Acrobat Reader software.

ANNUAL REPORTS

Copies of the Annual Reports of the Veterinary Products Committee (VPC) and the Appraisal Panel from 1999 are available on the VPC website. VPC Annual Reports up to and including the Report for 2004 were also included in the 'Annual Reports of the Medicines Commission and Section 4 Committees' published by the Medicines and Healthcare products Regulatory Agency (www.mhra.gov.uk).

OTHER VPC REPORTS

VPC Report - Risk Associated with the Use of Hormonal Substances in Food-Producing Animals - published June 2006.

17 Consultation Responses Received on VPC report.

VPC Consideration and Comments on the 17 Consultation Responses.

A Response to the Soil Association Press Release on a VPC Report and Hormonal Growth Promoters.

News release - EU Hormones Ban; New Independent UK Scientific Assessment by the Veterinary Products Committee - published July 2006.

Needlestick Injuries (Joint letter from the Chairmen of the VPC and the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines).

Advice on the use of Sheep Dips through showers and similar equipment – published February 2001.

Veterinary Products Committee further report on Organophosphorus sheep dips – published June 2000.

Report on Organophosphorus Sheep Dips - Published December 1999.

Report of the Veterinary Products Committee to the Licensing Authority on Products with an Organophosphate as Active Ingredient (other than Sheep Dips) - Published July 1999.

Advice on the Report of the Institute of Occupational Medicine - Organophosphorus Sheep Dips - Published July 1999.

News Release - Further Safety Measures for Sheep Dips - Published January 1998.

Advice to the Licensing Authority on the Safety of Recombinant Bovine Somatotropin (rBST) - Published October 1999.

WORKING GROUP REPORTS

VPC Report - Risk Associated with the Use of Hormonal Substances in Food Producing Animal - Published July 2006.

VPC Working Group on the Review of SARSS and Government Response – report published March 2004.

VPC Working Group on Antimicrobial Resistance and Government Response – report published 2003.

VPC Working Group on Feline and Canine Vaccinations - final report published February 2002.

Report of the Working Group on the Safety of Recombinant Bovine Somatotropin (rBST) - Published October 1999.

Sub Group on Hormonal Growth Promoters - Published October 1999.

SUMMARY MINUTES OF MEETINGS

Summary minutes of all VPC meetings held since January 2000, Appraisal Panel meetings since March 2004 and MSP meetings since October 2004 are available on the VPC website.

THE COST OF THE VPC AND ITS SUB-COMMITTEES

Summary of costs of the VPC and its sub-committees 2007

	Meetings held		Travel & subsistence		Preparation & attendance		Other costs		TOTAL	
	2006	**2007**	2006	**2007**	2006	**2007**	2006	**2007**	2006	**2007**
VPC*	6	6	50,461	**55,326**	31,946	**41,584**	24,496	**25,147**	106,903	**122,057**
Appraisal Panel	3	3	3,132	**4,332**	2,543	**4,598**	0	**0**	5,675	**8,930**
MSP	3	2	3,694	**3,090**	3,382	**4,458**	0	**0**	7,076	**7,548**
Appointment exercise	-		0	**154**	0	**0**	0	**0**	0	**154**
TOTAL	12	11	57,287	**62,902**	37,871	**50,640**	24,496	**25,147**	119,654	**138,689**

Comparison of cost of the VPC and its sub-committees 2003 – 2007

	2003	**2004**	**2005**	**2006**	**2007**
VPC*	175,951	166,345	126,667	106,903	**122,057**
Appraisal Panel	8,147	9,950	8,867	5,675	**8,930**
MSP	3,648	7,310	6,447	7,076	**7,548**
Appointment exercise	6,722	0	3,938	0	**154**
TOTAL	194,468	183,605	145,919	119,654	**138,689**

* including its working groups and the open meeting.

THE AUTHORISATION PROCEDURE AND THE ROLE OF THE VMD

BACKGROUND

Since 1968, the licensing, sale and supply of veterinary medicines have been controlled in the United Kingdom, first under the Medicines Act 1968 and, since 1 January 1995, under legislation relying directly upon the provisions of European Community (EC) law.

The procedures that came into effect on 1 January 1995 introduced two new systems, the 'Centralised' and 'Mutual Recognition' routes to facilitate the authorisation of veterinary medicines throughout the European Union (EU) alongside the existing 'National' arrangements.

On 30 October 2005 the Medicines Act 1968 was disapplied to veterinary medicines by means of the Veterinary Medicines Regulations 2005 (S.I 2005/2745). These regulations, which are updated annually by replacement regulations, also implemented the amended Community Directives, which, amongst other things, introduced the 'Decentralised' procedure that provides another route for the authorisation of veterinary medicines.

Whilst new applications tend to be made under EU procedures the majority of authorised veterinary medicines on the UK market (and indeed in other member states) continue to be authorisations granted under the National procedures.

AUTHORISATION PROCEDURES

National procedure

Where a company wants to obtain a Marketing Authorisation (MA) to place a product on the market in the UK under the 'National procedure', it must provide the Veterinary Medicines Directorate (VMD) with a dossier, in the form required by the EC, for assessment together with the appropriate fee. This dossier will be scientifically assessed by VMD and, if necessary, the Veterinary Products Committee (VPC), as follows and, if it meets the criteria of safety, quality and efficacy, a MA, valid only in the UK, will be granted.

If after consideration by VMD assessors the data is considered to be satisfactory the application will be authorised. However, if it is considered unsatisfactory or the application is in respect of a new active ingredient, or for a novel use, it will be peer reviewed within VMD by either the Biologicals Committee (BioComm) for immunologicals, or the Scientific Secretariat (SciSec) for pharmaceuticals. Officials from other government departments and agencies, including the Department of Health, Food Standards Agency, Environment Agency, Health Protection Agency, Health and Safety Executive, Centre for Environment, Fisheries and Aquaculture Science, the Department of Agriculture and Rural Development Northern Ireland, the Scottish Executive Environment and Rural Affairs Department and its agencies, and the National Assembly of Wales Department for Environment, Planning and Countryside, are consulted as necessary.

If, after peer review, the application is considered to be unsatisfactory or it is for a new active ingredient, or for a novel use, the application may be refused or recommended for consideration by the VPC. As with the BioComm and SciSec, officials from other government departments and agencies are consulted as necessary and may attend meetings to respond to questions from the VPC.

If the data dossier is to be considered by the VPC, members with the appropriate expertise to address the specific areas of concern are identified and asked to lead the discussion at the VPC meeting.

The VMD assessor's report is sent with the relevant data to the nominated VPC member(s) 14 days before the VPC meeting at which it is to be considered.

After consideration by the VPC, the VMD will take account of the issues that the VPC considers should be resolved with the applicant before deciding whether to grant the authorisation, grant it other than in accordance with the application or refuse it.

If the VMD decides to either grant the authorisation other than in accordance with the application, or refuse it, the applicant will be offered the opportunity to appeal against that decision to the VPC.

Mutual Recognition procedure
If, having been granted a National MA, the company then wishes to market the product in one or more other member states, it has to apply to those member states, under the 'Mutual Recognition procedure'. Under this procedure an applicant wishing to market a veterinary medicinal product in more than one member state may ask a second or subsequent member state(s) (Concerned Member State(s) or CMS) to recognise, within a period of 90 days, the MA granted by the first member state (Reference Member State or RMS).

The objective of this procedure is to facilitate access to a single market by relying on the principle of mutual recognition under which a MA granted in one member state ought, in principle, to be recognised by the competent authority of another member state.

Mutual recognition of the RMS's authorisation does not however extend to the distribution classification applied to the product unless, of course, it is required by Community to be made available only under a veterinary prescription.

Where the UK is the RMS no input is required from the VPC as the product would have already been through the UK National authorisation procedures. However, if the UK is a CMS i.e. is recognising a product authorised in another member state then the VPC may be asked for advice if the product contains a new active substance, or has a novel use, within the UK.

When the VMD receives the application, assessors are selected to carry out an assessment of the data and VPC members with appropriate expertise are advised that they have been nominated to consider the application. As the timescale for assessing applications under this procedure makes it impossible for them to be considered by all members, a summary of applications will be presented to the VPC, for information.

Decentralised procedure
Where a company wishes to obtain a marketing authorisation valid in a number of member states, providing that the product is not already authorised within the EC it may submit national applications simultaneously in a number of member states, under the 'Decentralised procedure'.

The applicant will choose a member state to act as the RMS. The RMS then prepares a draft assessment report on the data provided by the applicant. This assessment report is forwarded to the CMS for comment. When all comments have been received, the RMS will send a consolidated list of questions for the applicant to address. On receipt of a valid response from the applicant the RMS will update the draft assessment report to take account of the applicant's response and circulate it to the CMS.

The CMS has to agree the Summary of Product Characteristics and Product Literature and to resolve any final outstanding issues with the applicant. After this period all parties (RMS and CMS) will, if the product is accepted, issue National MAs.

When the VMD receives the application assessors are selected to carry out an assessment of the data and VPC members with appropriate expertise are advised that they have been nominated to consider the application. The timescale for assessing Decentralised applications makes it impossible for them to be considered by all members. A summary of applications considered under this procedure will be presented to the VPC, for information.

Centralised procedure
The European Medicines Agency (EMEA) deals with Centralised authorisations, arbitrates on Mutual Recognition and Decentralised applications and co-ordinates action on suspected adverse reactions (pharmacovigilance). The Committee for Medicinal Products for Veterinary Use (CVMP) is part of the EMEA, as are corresponding committees for products for human use and 'orphan' products for human use.

Where a company wishes to obtain a marketing authorisation valid throughout the EC it submits the dossier to the EMEA under the 'Centralised procedure'. The Community will consider applications for marketing authorisations for:

veterinary medicinal products referred to in the Annex to Regulation (EC) No 726/2004, which may only be authorised via the Centralised procedure (mandatory scope),

veterinary medicinal products referred to in Article 3(2) of Regulation (EC) No 726/2004, relating to products containing new active substances, products which constitute a significant therapeutic, scientific or technical innovation or products for which the granting of a Community authorisation would be in the interest of patients or animal health at Community level. The applicant has to request that the product be authorised through the Centralised procedure (optional scope) and the EMEA will decide on the matter, and

a generic veterinary medicinal product of a centrally authorised veterinary medicinal product if not using the option in Article 3(3) of Regulation (EC) No 726/2004.

The applicant submits a letter of intent to the EMEA for consideration by the CVMP, which will allocate a rapporteur and a co-rapporteur to prepare a detailed assessment report of the application. The applicant then submits the data dossier to the EMEA for consideration and, following a validation process, the applicant is authorised to submit a copy of the dossier to the Regulatory Authority in each EU member state for their assessment.

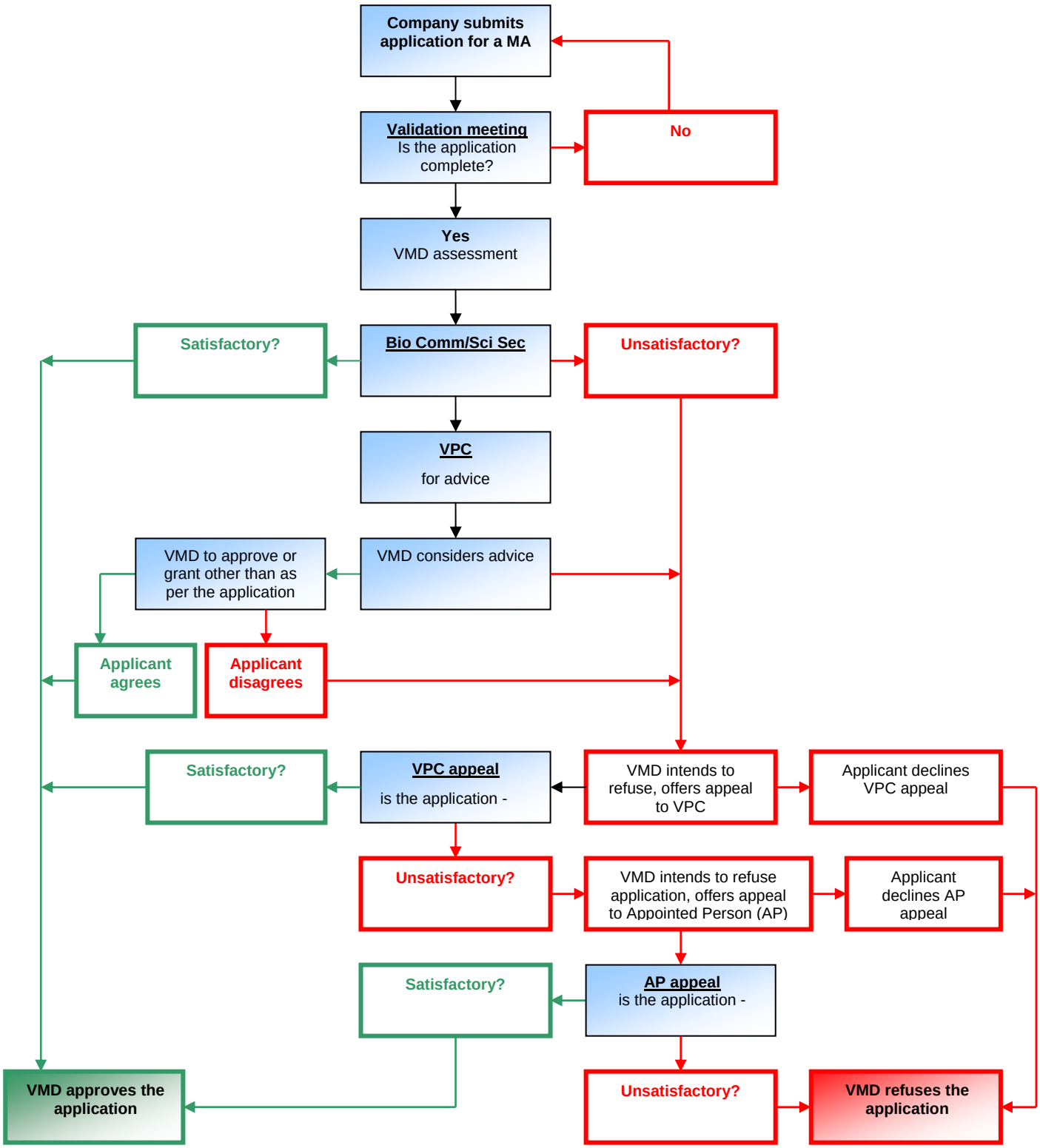
When the VMD receives the application assessors are selected to carry out an assessment of the data and VPC members with appropriate expertise are advised that they have been nominated to consider the application.

Because the timescale for assessing Centralised applications makes it impossible for them to be considered by all members, the assessor's report is sent to the nominated VPC member who then has (up to) 14 days to comment. If necessary, the VPC member may view the dossier at the VMD. The VPC member's comments are included in the report that goes forward from the VMD to the CVMP and is copied to the VPC for information.

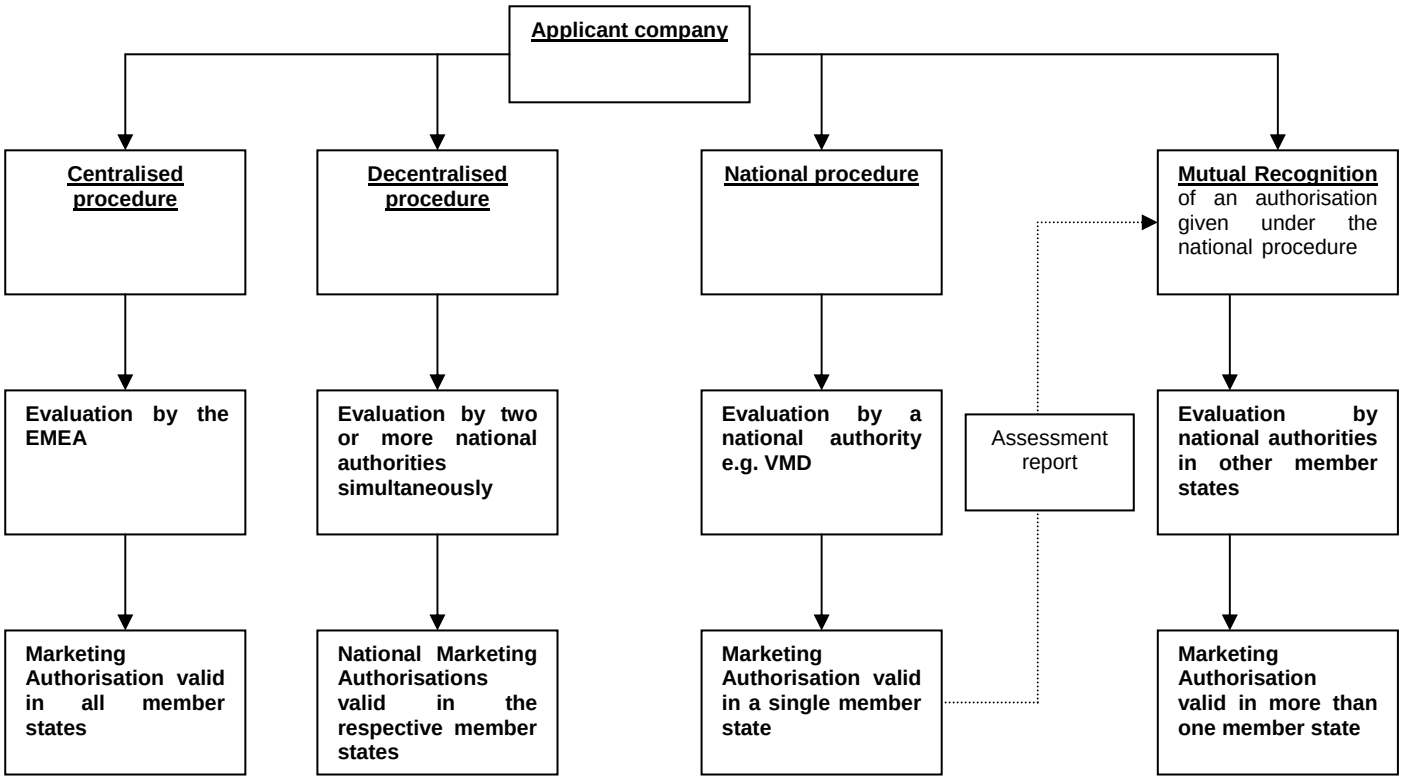
If it meets the scientific criteria of safety, quality and efficacy, the CVMP will deliver a positive opinion on the application, which is then forwarded to the Commission, which in turn will issue a Community Decision authorising the product.

All products authorised under this route are classified as Prescription Only Medicines. There is no mechanism for this categorisation to be reviewed at a later stage in the product's life.

NATIONAL AUTHORISATION PROCEDURE



ROUTES TO APPROVAL FOR VETERINARY MEDICINAL PRODUCTS



THE SUSPECTED ADVERSE REACTION SURVEILLANCE SCHEME

BACKGROUND

As part of its remit, the Veterinary Products Committee (VPC) is required to promote the collection of information relating to suspected adverse reactions (SARs) to veterinary medicines for the purpose of enabling advice to be given on the use of products and their effects. A SAR is a harmful and unintended reaction (in an animal or a human), which may be due to exposure to an animal medicine administered to an animal at its normal dose.

To assist the VPC in meeting this requirement, the Veterinary Medicines Directorate (VMD) prepares reports of SARs under the Suspected Adverse Reaction Surveillance Scheme (SARSS), a voluntary reporting scheme for monitoring animal and human SARs to animal medicines, for the VPC's consideration.

The scheme also records reports of off-label use, instances where a medicine does not work as intended (i.e. lack of efficacy), adverse environmental effects and problems with residues of animal medicines in human food relating to the validity of withdrawal periods.

Exposure can occur when animals are being treated with, for example, vaccines, antibiotics, anaesthetics, tick and flea control products or sheep dips. People can be exposed to animal medicines by, for example, self-injection or when handling recently treated animals.

Serious SARs involving veterinary medicines are reported to the VMD by the Marketing Authorisation (MA) holders as required by the European Community Directives on animal medicines, but anyone can report a SAR to an animal medicine that they have experienced or observed. In particular, however, veterinary surgeons, farmers, doctors and pharmacists are all encouraged to report to the SARSS. Environmental incidents are usually reported by the Environment Agency, Scottish Environment Protection Agency, Environment and Heritage Service of Northern Ireland, Wildlife Incident Investigation Scheme and MA holders.

The wide publicity that SARs received in 2005 following the publication of the letter on needlestick injuries from the Chairmen of the VPC and the Appraisal Panel resulted in an increase in reporting which has continued throughout 2006 and 2007. However, the under-reporting of SARs continues to give concern and the VMD encourages anyone who considers that they might have suffered an adverse reaction to an animal medicine to report directly to the VMD or to the MA holder.

Reports of human and animal SARs should be submitted via the voluntary 'yellow form' scheme; environmental incidents should be submitted via the voluntary 'blue form' scheme. Reporting forms, examples of which are given at **Annex H**, are available, free of charge, from the VMD and on the VMD website. If you would like further information on the SARSS, please contact the SARSS team at the VMD, Woodham Lane, New Haw, Addlestone, Surrey, KT15 3LS (tel: **01932 336911**, email **postmaster@vmd.defra.gsi.gov.uk**, fax: **01932 336618**)

Every report is acknowledged and its contents entered on an electronic database. All information in the report, and any information received subsequently, is treated in confidence. Each report is carefully examined to assess the following criteria:

the severity of the reaction;

any previous reports to the same or similar products;

whether any further information is required; and

follow up action required, which could include:

monitoring future reports about the product;

recommending changes to the product literature, labels and package inserts;

suspending the sale and supply of the product or of a specific batch of that product; and

revoking the MA for the product.

The VMD also receives reports relating to non-authorised veterinary products and pesticides etc.. These are passed to the appropriate authorities for consideration and are not included in the totals here.

SUMMARY OF SAR REPORTS RECEIVED BY THE VMD

The VMD received a total of 3,029 reports of SARs during 2007: 2,687 in animals, 120 in humans and 42 relating to environment incidents. The number of reports received excludes those that were subsequently categorised as asymptomatic incidents, i.e. where no information about symptoms was provided despite being followed up by the VMD.

Reports of SARs 2002 – 2006

The number of SAR reports received by the VMD in each of the years from 2003 is given in Table A, below. The 3,029 reports received in 2007 represent an increase of almost 75% over the last five years.

Table A:

	2003	2004	2005	2006	2007
Animal	1,657	2,048	1,980	2,391	**2,867**
Human	90	70	104	126	**120**
Environmental	9	11	81	63	**42**
TOTAL	1,756	2,129	2,165	2,580	**3,029**

REPORTS OF HUMAN SARS RECEIVED BY THE VMD

Of the 120 reports of SARs in humans exposed to animal medicines during 2007:

62 related to ectoparasiticide/endectocide animal medicines such as sheep dips, sprays and spot-on products. (Endectocide products are included within the ectoparasiticide group as the indications for the two groups overlap. Ectoparasiticide products are indicated for the treatment and control of external parasites e.g. fleas,

lice, mange mites and ticks, endectocide products can be indicated for the treatment of external or internal parasites.)

23 involved vaccines and

35 involved other medicines such as antimicrobials, anti-inflammatories, anthelmintics and neurological agents such as anaesthetics and sedatives.

There were 35 reports of needlestick injuries involving the use of vaccines and other injectable products, five of which were classed as serious, the remainder as non-serious.

Sources of reports of human SARs 2002 - 2006

Table B below shows the sources of reports received by the VMD. Although the majority of reports to the VMD are sent in by MA holders, they in turn would have been reported to the MA holder by their representatives in the field, their distributors or directly from veterinary surgeons, farmers, the general public and others. Each report received by the VMD is checked against information held on the database to ensure that reports of the same incident received from different sources are entered on the database as a single report.

The number of reports from veterinary surgeons fell in 2007 following the slight increases in 2005 and 2006. The very low number of reports from them and the general public, and the absence of any reports from farmers, doctors and pharmacists could suggest that they were reporting direct to the MA holders, but it seems more likely that SARs are simply not being reported, possibly through a lack of awareness of the SARSS.

Prior to 2000, the VMD received reports from organisations such as the Health and Safety Executive and the National Poisons Information Service (NPIS) but since then enquirers to the NPIS have been encouraged to report directly to the VMD or the MA holder.

Table B:

	2003	**2004**	**2005**	**2006**	**2007**	**5 year Total**
MA Holders	79	59	95	110	**109**	452
Veterinary surgeons	7	4	7	9	**4**	31
Farmers	1	3	0	0	**0**	4
General public	1	1	2	7	**6**	17
Doctors and pharmacists	1	2	0	0	**0**	3
Other (HSE etc)	1	1	0	0	**1**	3
TOTAL	90	70	104	126	**120**	510

Reports of serious and non-serious human SARs 2002 – 2006

Of the 120 reports of SARs in humans exposed to animal medicines during 2007, 114 were categorised as non-serious and six serious. Of the serious reports, five required hospital in-patient care and one was treated by the patient's GP. There were two reports of SARs causing persistent or irreversible symptoms.

Table C shows the pattern of reporting human SARs, categorised serious and non-serious, from 2003 to 2007. Although there was no change to the number of reports of non-serious human SARs received by VMD in 2007, there was a significant drop (50%) in the number of SARs provisionally categorised as serious.

Table C:

	2003	**2004**	**2005**	**2006**	**2007**	**5 year total**
Serious	17	8	9	12	**6**	52
Non-serious	73	62	95	114	**114**	458
TOTAL	90	70	104	126	**120**	510

Human SAR reports received by the VMD 2002 - 2006

In Table D below, the reports of human SARs received by the VMD between 2003 and 2007 provisionally categorised as serious and non-serious are categorised by type of product involved.

Table D:

		2003	**2004**	**2005**	**2006**	**2007**	**5 year total**
Ectoparasiticides* – Non-OP small animal	Serious	6	3	5	4	**1**	19
	Non-serious	27	12	24	42	**39**	144
Ectoparasiticides* – Non-OP large animal	Serious	0	2	0	2	**0**	4
	Non-serious	8	9	15	14	**20**	66
Ectoparasiticides – OP sheep dips	Serious	3	0	0	0	**0**	3
	Non-serious	0	0	0	0	**1**	1
Ectoparasiticides – OP non-sheep dips	Serious	1	0	0	0	**0**	1
	Non-serious	1	0	1	0	**1**	3
Vaccines	Serious	3	0	3	3	**4**	13
	Non-serious	19	19	31	25	**19**	113
Other animal medicines	Serious	4	3	1	3	**1**	12
	Non-serious	18	22	24	33	**34**	131
TOTAL	Serious	17	8	9	12	**6**	52
	Non-serious	73	62	95	114	**114**	458

* including endectocides.

Human SARs for 2002 - 2006 by therapeutic group

Table E shows a summary of human SARs for 2003 to 2007 broken down into the different therapeutic groups of the animal medicines involved. The majority of reports related to ectoparasiticide products, followed by vaccines with the majority of these SARs relating to accidental self-injection.

Table E:

	2003	2004	2005	2006	2007	5 Year Total
Ectoparasiticides	46	26	45	62	**62**	241
Vaccines	22	20	29	28	**23**	122
Antimicrobials	3	4	10	7	**9**	33
Anaesthetics	0	0	0	0	**0**	0
Anthelmintics	3	1	1	5	**4**	14
Hormones	0	0	0	2	**3**	5
Antiseptics	2	0	0	1	**0**	3
Other therapeutic groups	14	19	19	21	**19**	92
Total	90	70	104	126	**120**	510

Comparison of sales, in tonnes of active substance, of ectoparasiticide/endectocide products for use in sheep with the number of human SARs received 2002– 2006

The sales of active substance, in tonnes, of all the ectoparasiticide/endectocide products for use in sheep are compared with the number of human SARs received at Table F. The sales figures show a fluctuating pattern but there has been a general decrease in the amount of active substance sold over the five years. The sales of Organophosphate (OP) dips in 2007 fell by almost 50% over 2006, in spite of the continuing suspension of MAs for the non-OP dips. Non-OP pour-ons continued to increase their share of the market with sales in 2007 up by 17%, whereas the sales of injectables continued to fall (by 26%).

Table F:

	2003		2004		2005		2006		2007	
	Sales	SARs	Sales	SARs	Sales	SARs	Sales	SARs	**Sales**	**SARs**
OP dips	54.0	3	20.5	0	39.2	0	37.7	0	**19.34**	**1**
Non-OP dips	8.0	1	5.5	0	5.2	0	1.45	2	**0**	**0**
Non-OP pour-ons	15.2	3	17.4	8	18.8	9	20.86	6	**24.51**	**13**
Injectables	0.356	1	0.409	1	0.389	0	0.339	4	**0.250**	**4**

SARs to OP sheep dips

The VMD received a report of an acute human SAR to an OP sheep dip for the first time since 2002, when two reports were received for which the onset of symptoms began in 1966 and 1981.

In Table G the sales of OP sheep dip active substance are compared with the year of onset of symptoms for acute and chronic SARs (excluding SAR reports where year of onset is not provided).

Table G:

Reported year of onset of:	2003	2004	2005	2006	2007
* acute SARs	0	0	0	0	**1**
** chronic SARs	0	0	0	0	**0**
Sales of OP dip: tonnes active substance	54	20.5	39.2	37.7	**19.3**

*Acute reaction: signs and/or symptoms that begin soon after exposure and cease shortly after exposure ends.
**Chronic reaction: signs and/or symptoms that persist after single, repeated or long exposure.

REPORTS OF ANIMAL SARS RECEIVED BY THE VMD

Categorisation of animal SARs 2003 – 2007

There was a further rise in the number of reports of SARs in animals received in 2007 (2,866) over 2006 (2,391). Table H, below shows how they were categorised.

Table H:

	2003	2004	2005	2006	2007
Suspected to be product-related	596	843	842	1,250	**1,501**
Inconclusive	994	1,061	1,053	1,034	**1,142**
Not related to the use of the product	67	144	85	107	**223**
TOTAL	1,657	2,048	1,980	2,391	**2,866**

Table I summarises the reports of animal SARs received by the VMD between 2003 and 2007 categorised as either possible SARs or non-SARs.

Table I:

		2003	2004	2005	2006	2007
Provisionally categorised as possible SARs	Authorised use	1,256	1,399	1,378	1,659	**1,842**
	Unauthorised use	161	191	285	249	**230**
Provisionally categorised as possible non-SARs	Lack of efficacy	173	275	162	284	**507**
	Unauthorised product	65	68	64	97	**55**
	Unlikely to be product related	0	114	85	96	**218**
	Animal Test Certificate	2	1	6	6	**14**
TOTAL		1,657	2,048	1,980	2,391	**2866**

REPORTS OF SUSPECTED ENVIRONMENTAL INCIDENTS RECEIVED BY THE VMD

There was a drop in the number of environmental incidents reported to the VMD in 2007 (42) over 2006 (63). All of these were aquatic incidents, possibly as a result of sheep-dipping activity.

Table J shows the number of environmental incident reports that have been received by VMD in each year since 2003 including, for the first time, reports of environmental incidents occurring in Northern Ireland.

The number of reports received each year does not reflect the number of incidents that have occurred in that year because, in some cases, an incident may have been reported more than once, or reports may have been submitted in a year other than that in which the incident occurred.

Table J:

		2003	2004	2005	2006	2007
Aquatic incidents possibly due to sheep dip	England & Wales	3	8	77	56	**21**
	Scotland	3	0	4	3	**10**
	Northern Ireland	-	-	-	-	**11**
Other environment incidents	England & Wales	1	2	0	4	**0**
	Scotland	1	1	0	0	**0**
	Northern Ireland	0	0	0		**0**
TOTAL		8	11	81	63	**42**

FORM FOR REPORTING SUSPECTED ADVERSE REACTIONS IN ANIMALS TO VETERINARY MEDICINES

ASSURING THE SAFETY, QUALITY AND EFFICACY OF VETERINARY MEDICINES

Department for Environment, Food and Rural Affairs

Veterinary Medicines Directorate,

FREEPOST 4503, Woodham Lane, New Haw, Addlestone, Surrey KT15 3BR
Tel. No. 01932 338427 Fax: 01932 336618

IN CONFIDENCE

For Official Use Only

Adverse reaction No.	
SAR file	
Date rec'd	
Date ack.	

Suspected Adverse Reaction Surveillance Scheme (SARSS)

Animal suspected adverse reaction report

- This form should be completed in BLOCK LETTERS if hand written and sent to the FREEPOST address given above, whenever a suspected adverse reaction is observed in **animals** (including birds and fish) during or after the use of a veterinary medicine.

All reporters MUST complete this section

Full name of product

Product number (on label)* Batch number

** the product number is preceded by PL, VM or MA.*

This form will be copied to the Company (Marketing Authorisation holder) in order that they are aware of any reported suspected adverse reaction to their product. They may wish to contact you for further details. If you do not want the name(s) and address(es) on the form to be revealed to the Company, please tick this box .... ☐

Has the Company already been informed? YES ☐ NO ☐

Your reference No. (if any)

Full name and address of the person sending this form to VMD

County:
Postcode: Date:

Full address where reaction(s) occurred

County:
Postcode:

Full name and address of veterinarian involved

County:
Postcode:

Details of animal suspected adverse reaction(s)

Reason for using product

No. of animals treated on this occasion | No. of animals reacting | No. of deaths | Actual amount of product administered

Administered by (occupation) | Date of first administration | Duration of treatment

Site and route of administration | Previous use of product in this animal(s) YES ☐ NO ☐ | If **YES**, number of occasions

Date of reaction(s)	Species/Breed	Weight kg	Age	Sex (M/F)	Nature of reaction **including time of onset and duration of symptoms** *(continue on page 3 if necessary)*

Full details of products given concurrently (if any)

Immediate treatment given (if any)

Previous vaccination history (if immunological product involved in suspected adverse reaction) product No.* and batch No.

Post mortem and/or laboratory tests:
Have any post mortems or relevant diagnostic tests been performed ? ..... YES ☐ NO ☐
If **YES**, please attach copies or forward to VMD in due course

Comments:
If you have any comments or further information, please continue on page 3.

Receipt of this form will be acknowledged

MLA 252A (11/02)

FORM FOR REPORTING HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES

ASSURING THE SAFETY, QUALITY AND EFFICACY OF VETERINARY MEDICINES

Department for Environment, Food and Rural Affairs

Veterinary Medicines Directorate,

FREEPOST 4503, Woodham Lane, New Haw, Addlestone, Surrey KT15 3BR
Tel. No. 01932 338427 Fax: 01932 336618

IN CONFIDENCE

For Official Use Only

Adverse reaction No.	
SAR file	
Date rec'd	
Date ack.	

Suspected Adverse Reaction Surveillance Scheme (SARSS)

Report on suspected adverse reaction(s) in **humans**

- This form should be completed in BLOCK LETTERS if hand written and sent to the FREEPOST address given above, whenever a suspected adverse reaction is observed in **humans** during or after the use of a veterinary medicine.

All reporters MUST complete this section

Full name of product

Product number (on label)* Batch number

** the product number is preceded by PL, VM or MA.*

This form will be copied to the Company (Marketing Authorisation holder) in order that they are aware of any reported suspected adverse reaction to their product. They may wish to contact you for further details. If you do not want the name(s) and address(es) on the form to be revealed to the Company, please tick this box .... ☐

Has the Company already been informed? YES ☐ NO ☐

Full name and address of the person sending this form to VMD

County:
Postcode:
Date:

Full address where reaction(s) occurred

County:
Postcode:

Your reference No. (if any)

Details of person experiencing reaction(s)

Title Initials Surname Sex male ☐ female ☐

Age 0-5 ☐ 6-17 ☐ 18-24 ☐ 25-44 ☐ 45-64 ☐ 65+ ☐

Occupation
(e.g. farmer, vet, pet owner)

Details of suspected adverse reaction(s) in humans

Date of exposure | Date of onset of symptoms | Species of animal being treated | No. of animals treated

Details of exposure/contact with veterinary medicine. If accidental, please give details of how accident occurred. If self injection, please give details of amount injected. *(continue on page 3 if necessary)*

Duration of symptoms
(e.g. 20 minutes, 5 days, ongoing 1+ month etc.)

Details of first symptoms

Details of symptoms occurring afterwards

Did you seek medical advice? .....YES ☐ NO ☐

If **YES**, did the doctor confirm that your symptoms were associated with exposure to the veterinary medicine?.....YES ☐ NO ☐

Give details of any treatment received:

Were you suffering from any illness (e.g. flu) or taking medication prior to exposure? ..... YES ☐ NO ☐

If **YES**, give details *(continue on page 3 if necessary)*

Receipt of this form will be acknowledged and further details may be requested.

MLA 252A (11/02)

FORM FOR REPORTING AN ENVIRONMENTAL INCIDENT INVOLVING A VETERINARY MEDICINE

Veterinary Medicines Directorate
FREEPOST KT 4503
Woodham Lane, New Haw
Addlestone, Surrey KT15 3BR
Tel No. 01932 338427
Fax No. 01932 336618
Website: www.vmd.gov.uk

IN CONFIDENCE

For Official Use Only

Env. incident no. ☐

VMP file if appropriate ☐

Date received ☐☐/☐☐/☐☐☐☐

Date acknowledged ☐☐/☐☐/☐☐☐☐

Environmental Incident Report

This form should be completed and sent to the address above whenever an environment incident is suspected of being related to the use of a veterinary medicine.

ALL REPORTERS MUST COMPLETE THIS SECTION

Date of incident: ..... ☐☐/☐☐/☐☐☐☐

Name of active ingredient (if known):

Name of product (if known):

Product number (on label) where available:

Has the appropriate pollution control agency (EA, SEPA), Wildlife Incident Investigation Scheme (WIIS) [and other agencies in Scotland and Northern Ireland] already been informed of this environmental incident?

- If YES, please give details overleaf.
- If NO, please contact the relevant agency:
  - EA - 0800 807060
  - SEPA - 0800 807060
  - WIIS - 0800 321600

Your reference number (if any):

Name and address of person sending this form to the VMD:

Postcode:

Address where the incident(s) occurred or water course affected:

Postcode: Grid reference:

Has the Marketing Authorisation (MA) holder already been informed? YES ☐ NO ☐

The MA holder may wish to contact you for further details. If you do not want the name(s) and address(es) on the form to be revealed, please tick this box..... ☐

Details of adverse effects on non-target ANIMAL* species through environmental exposure

**Animal species including birds, fish and invertebrates not treated with the veterinary medicine*

Species involved	No. of animals/length of watercourse affected	No. of deaths	Details of incident including nature of adverse effects and possible cause if known e.g. structural failure

Please attach any further information and/or continue overleaf.

Is there any further information to follow? .....YES ☐ NO ☐

Details of adverse effects in HUMANS following environmental exposure

No. of people involved: ☐ Date of exposure: ☐☐/☐☐/☐☐☐☐ Date of onset of symptoms: ☐☐/☐☐/☐☐☐☐

Name(s) if available	Details of environmental exposure and nature of adverse effects

Please attach any further information and/or continue overleaf.

Is there any further information to follow? YES ☐ NO ☐ Tick this box if extra forms are required ☐

SUGGESTIONS FOR KEY INFORMATION NEEDED IN HUMAN SUSPECTED ADVERSE REACTION REPORTS

A. Information required from the reporter/subject:

1. Name, occupation, and contact details of reporter.

2. What is the current nature of their ill-health?

3. What was the nature and the timing of the development of their ill-health (onset and duration of any phases)?

4. Is the ill-health acute, chronic, or relapsing?

5. Has a GP been consulted? Obtain their contact details and permission to contact them.

6. Are other people known to be similarly affected (e.g. family members, work colleagues)?

7. What is the name of the veterinary product(s) implicated?

8. How, by whom, and when was it used? The intention here is to establish the degree of exposure to the product, the most significant likely route(s) of exposure (e.g. dermal, oral, inhalation, injection), the number of exposures/animals treated, the precautions (e.g. gloves) that were used to minimise exposure, and the timing of the exposures relative to that of the ill-health. This will probably require some element of interactive questioning, especially if there is more than one exposure or episode of ill-health. Some specialised occupational groups, such as farmers, may require their own specialised sets of questions and have records of product use. Also to include a note of the size of the premises i.e. the number of animals.

9. Was this their first use of the product?

10. Have they had a problem with this or a related product before?

11. Were there any significant events coincident with exposure (e.g. exposure to animal dander, infection, occupational) that might have influenced or pre-disposed to ill-health?

12. What was their general state of health prior to the incident?
    Did the patient have asthma ☐ or eczema ☐?

13. Has the manufacturer of the product been informed?

B. Information required from any medical source (GP, consultant, hospital admission)

14. The nature and timing of the ill-health.

15. Clinical test results that bear on (14).

16. Any measures or estimates of exposure.

17. An opinion on likely causation.

18. Relevant information on the reporter's general health and any concurrent medical treatments. To include a structured tick list of illnesses.

C. Information required from the manufacturer

19. All reports of ill-health, as for (A).

20. Sales information to provide a measure of product use levels to put suspected adverse reaction(s) into context.

D. Information required from the Appraisal Panel

21. What is the nature of the ill-health reported, and does it fit into a known syndrome?

22. Is it likely to be related to use of a veterinary product?

23. Has this form of ill-health been seen previously in association with the product?

24. Is the ill-health consistent with known effects of the product or is it novel?

25. Was the product used as instructed? If not, was the mis-use avoidable?

26. Does action need to be taken to advise the Veterinary Products Committee on restricting product use/re-labelling?

GUIDELINES FOR THE ASSESSMENT OF HUMAN SUSPECTED ADVERSE REACTIONS REPORTS BY THE APPRAISAL PANEL FOR HUMAN SUSPECTED ADVERSE REACTIONS TO VETERINARY MEDICINES

PURPOSE

1. The purpose of this document is to set out guidelines for the assessment of suspected human adverse reaction (SAR) reports to veterinary medicines by the Appraisal Panel for Human Suspected Adverse Reactions to Veterinary Medicines (Appraisal Panel).

BACKGROUND

2. In June 1996 the Parliamentary Secretary of the then Ministry of Agriculture Fisheries and Food, Mrs Browning commissioned Professor Lawson, Chairman of the Medicines Commission to review the responsibility for monitoring and investigating human SARs. The Minister and the Veterinary Medicines Directorate (VMD) accepted Professor Lawson's report and recommendations. The recommendations were designed to improve public confidence in the objectivity of the administration of the scheme.

3. The major recommendation pertinent to the assessment of SAR reports is that "the objective of the scheme should be to identify trends in relation to human SARs and to generate hypotheses as to the possible causes of these trends".

PROCEDURE

4. The Appraisal Panel has adopted a non-causality approach as recommended in the report. However, in identifying trends it is sometimes necessary to establish the significance of a SAR and/or validate the data. In such cases the Appraisal Panel may undertake individual case assessment to assist in identifying trends and to generate hypotheses as to the possible causes of these trends.

5. To achieve its remit as outlined on pages 31 and 32, the Appraisal Panel will evaluate all SARs. However to increase the objectivity and the reliability of these reports, medical practitioners participation in the scheme should be encouraged.

6. The consideration of SAR reports by the Appraisal Panel will be prioritised as follows:

- all serious suspected adverse reactions
- reports involving new products with new active substances/formulation or as requested by the Veterinary Products Committee (VPC)
- reports involving all other products with species, routes or dosage forms new to veterinary medicines
- reports for products or active substances which have increased by a significant factor over the previous year

- reports following a change in work practices or use

- all other reports.

7. To assist the Appraisal Panel in setting priorities in its work programme, the Suspected Adverse Reaction Surveillance Scheme (SARSS) team will maintain a list of SARs to products by active substance.

8. The Appraisal Panel will establish its work programme at the first meeting of the year, which will be reviewed from time to time.

9. To assist the Appraisal Panel in accomplishing its task, the SARSS team will prepare a paper before each meeting analysing the trends for the group of SARs to be discussed. In order to facilitate the evaluation process, reports will be grouped within each priority category. For example, all reports for which medical reports have been received will be grouped together, as will reports that provided detailed information on exposure and control measures including protective clothing etc. The analysis paper and copies of all the SARs received by the VMD during the period concerned will be circulated to the Panel members prior to the meeting.

10. Where a member is unable to attend a meeting, his/her comment on the SARs listed for consideration should reach the SARSS team at least three days before the meeting.

ACRONYMS AND ABBREVIATIONS

Appraisal Panel	Appraisal Panel for Human Suspected Averse Reactions to Veterinary medicines (VPC sub-committee)
ATC	Animal Test Certificate
BioComm	Biologicals Committee (VMD peer review group, Immunologicals)
CMS	Concerned Member State
CST	Committee Support Team
CVMP	Committee for Medicinal Products for Veterinary Use
Defra	Department for Environment, Food & Rural Affairs
EC	European Commission
ECG	Electrocardiogram
EMEA	The European Medicines Evaluation Agency
EU	European Union
FSA	Food Standards Agency
IGHRC	Interdepartmental Group on Health Risks from Chemicals
MA	Marketing Authorisation
MRL	Maximum Residue Limit
MSP	Medical and Scientific Panel (VPC sub-committee)
NPIS	National Poisons Information Service
OCPA	The Office of the Commissioner for Public Appointments
OP	Organophosphate
OSI	Office of Science and Innovation
PMA	Provisional Marketing Authorisation
POM-V	Prescription Only Medicine – Veterinarian (MA distribution category)
RMS	Reference Member State
SAR	Suspected Adverse Reaction
SARSS	Suspected Adverse Reaction Surveillance Scheme
Sci Sec	Scientific Secretariat (VMD peer review group, Pharmaceuticals)
SCVPH	Scientific Committee on Veterinary measures relating to Public Health
SP	Synthetic Pyrethroid
SQP	Suitably Qualified Person who is registered with a body approved under the Veterinary Medicines Regulations
VMD	Veterinary Medicines Directorate
VPC	Veterinary Products Committee