PORTFOLIO COMMITTEE NO. 2 - HEALTH INQUIRY INTO USE OF PRIMATES AND OTHER ANIMALS IN MEDICAL RESEARCH IN NEW SOUTH WALES HEARING – 1 JUNE 2022

PORTFOLIO COMMITTEE NO. 2 - HEALTH
INQUIRY INTO USE OF PRIMATES AND OTHER ANIMALS IN MEDICAL RESEARCH IN NEW SOUTH WALES
HEARING – 1 JUNE 2022
QUESTIONS ON NOTICE TO THE DEPARTMENT OF PRIMARY INDUSTRIES AND ANIMAL RESEARCH REVIEW PANEL

Transcript page	QoN	Answer
Pg 54	**The Hon. EMMA HURST:** One of the documents that we received as part of an SO 52 showed one facility killed 807 animals that were bred in excess. Is that normal that such a large number of animals are being killed because they've been over-bred or is that quite a specific situation?	• The Hon. Emma Hurst referred to the presented document as an agenda item of the Animal Research Review Panel (ARRP). • This is incorrect. The document contains notes from a discussion between the Animal Research Veterinary Inspector and members of the ARRP, as part of an animal research establishment inspection attended by the Inspector and the ARRP members. • The inspection team questioned the report which details 807 excess animals bred were killed. • The response from the establishment was *Committee advised it proactively looks at animal use statistics and has previously raised issues in the past if it has identified a high level of excess/wastage of animals. Breeding reports are required every 6 months from all facilities. Rehoming is not possible due to use of transgenic mice, pathogens, PC2 requirements etc at all facilities it oversees. However, committee does encourage researchers to make of use "excess mice" from breeding protocols in some ways (for example, where mice are needed for training protocols, staff are encouraged to make use of the "excess" mice such as those with the wrong genotype to meet these requirements, rather than specifically breeding more mice for this).* • The document shows this was a specific situation which was investigated during the inspection process. The response was considered satisfactory.

Pg 54	**The Hon. EMMA HURST:** Correct, yes. Item 9 says, "807 mice noted as culled in annual report". I'm just wondering if that is a common number that you would see as bred in excess of animals or do you think that that is quite an unusual figure to see? **JACQUELINE PHILLIPS:** Right, okay. I'll just have to look at what we've said in the discussion at the ARRP again. We have questioned this, obviously. It was brought to our attention as a point of consideration for the ARRP. In terms of other numbers, I probably am not in a position to quote. I wouldn't know off the top of my head what other numbers are from other committees or other reviews that we've looked at. However, because we have looked at this, we've obviously gone back to ask questions and to need further information about it. **The Hon. EMMA HURST:** So it was alerted to you as a high number. **JACQUELINE PHILLIPS:** The fact that we've looked at it and discussed it would suggest that the ARRP has had some concern about it. **The Hon. EMMA HURST:** Is there an actual reporting requirement on the culling of excess bred animals that goes directly to ARRP? I know that Dr Filmer said that the AEC oversees it, but is there an actual reporting requirement that goes back to ARRP	• There is no reporting requirement to the Animal Research Review Panel (ARRP) on excess culled breeding stock. • *The Australian Code for the care and use of animals for scientific purposes* requires that breeding animals for research must be managed to avoid or minimise the production of excess animals (Clauses 1.27 and 3.2.2 (iii)). • Animal Ethics Committees must monitor breeding programs to ensure overbreeding does not occur. • ARRP has developed a comprehensive guideline to assist AECs, which includes information to regularly be reported to the AEC by researchers to ensure breeding is matched to research requirements: ARRP Guideline 16: Animal Ethics Committee supervision of obtaining, breeding, keeping and supplying animals for use in research.

	specifically for excess culled breeding stock? **JACQUELINE PHILLIPS:** In terms of our reporting requirements in terms of numbers, each year the institutions have to report the total number of animals that have been used and they will be classified under various categories. So if animals are reported under excess breeding protocols, I'm not quite sure what the category is that they would come under, in terms of our annual statistics report this year. I don't think we actually break that one down specifically in terms of a number that we get from AECs in their annual reports. Wednesday, 1 June 2022 Legislative Council - UNCORRECTED Page 55 PORTFOLIO COMMITTEE NO. 2 - HEALTH **The Hon. EMMA HURST:** Okay, so that's not something that is recorded. **JACQUELINE PHILLIPS:** No. We get the animal numbers and we get their use per se, and that would be the type of category of usage that they've gone under in terms of the research. I don't have a recollection off the top my head as to whether we've got the— **The Hon. EMMA HURST:** If you could confirm, just on notice, that would be great.	
Pg. 57	**The Hon. EMMA HURST:** That is all right. I will move on to the DPI now. One concern that's	This question has been answered in supplementary question 1 below.

	been raised throughout this inquiry is around transparency and how funding is going to animal research from State and Federal government. The NHMRC has supplied us with some figures today, which are quite helpful, but we still don't have any specific number on how much State funding is actually channelled directly into animal research. I have asked the health Minister previously in budget estimates and haven't got any answers. Is there any insight into how much funding is actually going into animal research? If that data is not available, why isn't that being recorded and why isn't it accessible? **JOHN TRACEY:** I will have to take that on notice in terms of the funding amounts because I do not have that on hand. I guess for transparency, we strongly support transparency in terms of animal research and this activity. We do everything we can within the powers available to us to get information out.	

PORTFOLIO COMMITTEE NO. 2 - HEALTH
INQUIRY INTO USE OF PRIMATES AND OTHER ANIMALS IN MEDICAL RESEARCH IN NEW SOUTH WALES
HEARING – 1 JUNE 2022
SUPPLEMENTARY QUESTIONS TO THE DEPARTMENT OF PRIMARY INDUSTRIES AND ANIMAL RESEARCH REVIEW PANEL

Supplementary question	Answer
1. Is there any funding available from the NSW Government which is specifically targeted at developing alternatives to animal use in research? If so, please provide details.	**NSW Health:** • The NSW Ministry of Health, through the Office for Health and Medical Research, funds a number of grant programs in Advanced Therapeutics, a field which increasingly uses non-animal testing methods such as organoids and tissue explants. • One example of this funding is for a researcher to develop their liver-specific AAV capsid using a human liver explant rather than the traditional xenografted mice model. More information is available at: https://www.medicalresearch.nsw.gov.au/projects/bioengineering-of-next-generation-adeno-associated-viral-vectors/. • Further, funding of the Luminesce Alliance has also supported the organoid facility at Westmead's Children's Medical Research Institute, which helps develop and test advanced therapeutics. More information is available at: https://www.cmrijeansforgenes.org.au/research/research-facilities/scof. • While funding these types of biotechnology favours a shift towards non-animal approaches, it is incidental to developing alternatives to animal use in research. The Therapeutic Goods Administration and other overseas regulatory agencies require animal model testing in order to approve new therapies. Therefore, this step cannot be eliminated under current regulatory frameworks. **NSW Department of Primary Industries (NSW DPI):** • NSW DPI does not currently provide funding for targeted development of alternatives to animal use in research. • Every animal research project undertaken by NSW DPI, and organisations which use its animal ethics committees, must provide evidence that the project has considered alternatives to animal use. If an alternative cannot be

	used, significant justification for the use of animals must be included.
	• Projects undertaken by NSW DPI have identified and implemented alternatives to live animals, e.g.
	  ○ replacing live fish with autonomous sensors (Sensor Fish) to estimate mortalities associated with fish moving through river infrastructure e.g., dams.
	  ○ using environmental DNA (eDNA) to determine the presence of animals. eDNA (collecting water, soil or airs samples to determine if fragments of DNA are present) is a potential way to detect rare threatened species that would otherwise require sampling by traditional methods, such as netting and electrofishing, which capture and handle both target and non-target species.

2. The Committee received evidence that the DPI used to run seminars on alternatives to animal use in research and the 3R's, but these have been discontinued. Can you please explain why these seminars stopped, and indicate if there is any intention to start them up again?	• Animal Ethics seminars, run by NSW DPI and the ARRP approximately every two years until 2015, were discontinued due to resourcing requirements.
	• As part of their strategic plan, ARRP identified webinars as an effective method to engage with industry to protect and promote the welfare of animals used in research and teaching.
	• ARRP and DPI have committed to hosting 3 education and awareness webinars for the Animal Research community in 2022.
	  ○ Webinar 1: Research animal research rehoming (held 31 May 2022)
	  ○ Webinar 2: Research application statistics (planned for July 2022)
	  ○ Webinar 3: Ethical decision making (planned for Nov 2022)
	• Webinar 1 on Research animal rehoming was very well attended with 126 participants.
	• Feedback was extremely positive - 80% of respondents indicated they felt more informed to start rehoming program discussions or expand the current rehoming program at their establishment.
	• Webinar recordings have been circulated to participants and published on Animal Ethics Infolink as an ongoing educational resource.

3. What other resources or support does the DPI and/or ARRP provide to support research institutions in reducing or replacing the number of animals used?	NSW DPI and the Animal Research Review Panel liaise closely with establishments involved in the care and use of animals for research and teaching, and promote and foster best practice through: • Conducting inspections, which include detailed liaison with and feedback to establishments • Surveys and feedback requests used to inform the development of guidance material • Information sharing and promotion of best practice via industry e-newsletters • Maintenance of a dedicated website Animal Ethics Infolink. Infolink is a source of information, guidelines and resources for people involved in the care and use of animals for research and teaching. It includes a section specifically dedicated to the 3Rs. • DPI includes examples of 3R implementation by research establishments in each published annual Animal use in research statistics report. See 2020 report as an example. • Ongoing development of comprehensive policies and guidelines by the Animal Research Review Panel in response to identified needs.
4. There was some confusion raised during the inquiry as to where dogs and cats used in research sourced from, excluding from 'privately owned' dogs and cats. Can you please advise where dogs and cats used for research are being sourced from?	• Under the Animal Research Act 1985, there are special provisions that apply to the supply of dogs and cats for use in research. These provisions are in Schedule 1 Parts 2 and 3 of the Animal Research Regulation 2021. • Dogs and cats used in research may only be obtained from, and supplied by, a licensed animal supplier authorised to supply dogs and cats (unless they meet one of the exemptions under Schedule 3 of the Animal Research Regulation 2021, which includes privately owned animals that remain under the effective control of the owner).
5. Are there any licensed animal suppliers breeding dogs and cats for research in NSW? If so, can you please advise how many and provide details of these facilities?	• For the 2020 reporting year one (1) establishment reported use of dogs and cats in the category "Stock breeding" as part of their annual reporting of animal use statistics. This establishment is accredited as an animal research establishment and licensed as an animal supplier for dogs and cats.
6. Are research facilities breeding their own cats and dogs onsite for research purposes in NSW? If yes,	• See answer to 5 above.

how many facilities in NSW are doing this?	
7. How many research institutions in NSW were using dogs and cats in experiments in 2020 (excluding those using 'privately owned' dogs and cats)?	• Reporting for the 2020 year via Form L included returns from 7 accredited research establishments that used dogs and cats in research projects, and one return from the Secretary's AEC reporting use of dogs and cats (this return is not broken down to the level of the establishments overseen by the Secretary's AEC). • These numbers exclude establishments that reported only using dogs and cats that were in the Fate category *F4: Privately (non-research) owned and remained with the owner*.
8. At the Inquiry, Mr John Tracey stated that "The statistics for the 2020 reporting period again show that the vast majority of animals—so that's 98 per cent of cats and 91 per cent of dogs—are used in studies with minimal impact on the animal."	• See below.
8a. Could you please advise where this information appears in the 2020 Animal Use Statistics report?	• Reporting on all species categories of animals (including the species categories Domestic mammals Cats and Dogs), by Purpose and Procedure (impact) categories is contained in *Section 3 Purpose, Procedure and Species Charts 2020,* pages 11 – 24 of the *NSW 2020 Animal Use in Research Statistics report*. • Procedure categories with high impact on animal welfare are: • P5 Major surgery with recovery, • P7 Major physiological challenge, and • P8 Death as an endpoint. • The Procedure codes and their meaning are published on pages 66 and 67 of the *NSW 2020 Animal Use in Research Statistics report*.
8b. Does this statistic include research done on dogs and cats which are 'privately owned'?	• Yes. The annual return of animal use via Form L requires reporting on all animals used in research projects in the reporting year, including privately owned dogs and cats.
8c. Of the remaining 9% of dogs and 1% of cats not used in research with 'minimal impact', can you provide the details of the 'higher	• See tables below. Form L reporting categories are to the level of each approved research/teaching project, but do not provide detail on what each project involves.

impact' research studies performed on these dogs and cats – what were they testing for and where animals rehomed after the higher impact studies?	Of the 17 Domestic cats reported in the high impact category of major surgery with recovery, all were reported in the Fate category: *Privately (non-research) owned and remained with the owner*. An example of this type of research is an animal presented to a veterinary clinic for treatment and participates in a clinical trial. Of the 223 Domestic dogs reported in the high impact category of major surgery with recovery, 170 were reported in the Fate category: *Privately (non-research) owned and remained with the owner*. An example of this type of research is an animal presented to a veterinary clinic for treatment and participates in a clinical trial. The remaining 53 were reported in the Fate category: *Retained for use in other projects or supplied to another establishment / individual for research.*

Domestic Cats 2020

	Species	Procedure	Number
Domestic mammals	S31 Cats	P1 Observation Involving Minor Interference	402
		P3 Minor Conscious Intervention	401
		P4 Minor Surgery With Recovery	8
		P5 Major Surgery With Recovery	17
		P6 Minor Physiological Challenge	56
Total			**884**

High Impact Procedures

	Species	Procedure	Number
Domestic mammals	S31 Cats	P5 Major Surgery With Recovery	17
Total			**17**

Domestic Dogs 2020

	Species	Procedure	Number
Domestic mammals	S32 Dogs	P1 Observation Involving Minor Interference	663
		P3 Minor Conscious Intervention	1,372
		P4 Minor Surgery With Recovery	115
		P5 Major Surgery With Recovery	223
		P6 Minor Physiological Challenge	180
Total			**2,553**

High Impact Procedures

	Species	Procedure	Number
Domestic mammals	S32 Dogs	P5 Major Surgery With Recovery	223
Total			**223**

8d. Can you please provide a breakdown of all research studies performed on dogs and cats in NSW 2020 in accordance with the table below, and indicate what percentage of research on cats and dogs falls within each of these categories? Procedure Code Procedure description P1 Observation Involving Minor Interference P2 Animal Unconscious Without Recovery P3 Minor Conscious Intervention P4 Minor Surgery With Recovery P5 Major Surgery With Recovery P6 Minor Physiological Challenge P7 Major Physiological Challenge P8 Death As An Endpoint P9 Production of genetically modified animals	• See tables above. • Actual numbers provided, from which percentages can be calculated. • This information can also be calculated from the information published in *Section 3 Purpose, Procedure and Species Charts 2020* from pages 11 – 24 of the *NSW 2020 Animal Use in Research Statistics report*.