

SCHOOL OF BIOLOGICAL SCIENCES

FACULTY OF SCIENCES

Rm 106, BENHAM LABORATORIES THE UNIVERSITY OF ADELAIDE NORTH TERRACE SA 5005 AUSTRALIA

> TELEPHONE +61 8313 4042 Phill.cassey@adelaide.edu.au

CRICOS Provider Number 00123M

Department of Agriculture, Water and the Environment GPO Box 858 Canberra ACT

Friday, 18 September 2020

RE: Import risk review for psittacine birds from all countries

We welcome the opportunity to provide comments to The Department of Agriculture, Water and the Environment (hereafter referred to as "the Department") on the '<u>Import risk review for psittacine birds from all countries</u>' draft report (hereafter referred to as the "risk review").

Our comments are largely framed around the Biosecurity Act 2015, as applied to "diseases and pests that may cause harm to human, animal or plant health or the environment". Key to the Biosecurity Act 2015 is preventing the introduction, establishment and spread of invasive pest species. In our comments below, we emphasise that the risk review has omitted the risks of invasive species, which undermines the quality and scope of the Assessment. We have identified two key concerns which put Australia's economies and environments at risk by following the recommendations listed in the risk review, regardless of them being "subject to a range of biosecurity risk management measures":

1. Introduction of new invasive psittacine species

Several psittacine species on the Live Import List are declared pests as they cause extensive damage to industry (particularly agriculture), and environments globally, and have a high potential of establishing in Australia [1, 2]. Allowing the import of alien parrots would greatly increase the potential of new invasive pests to establish and spread, causing significant economic and environmental damage and requiring costly and intensive management [3].

2. Lack of an evidence-based cost-benefit analysis

The identifiable benefits of the proposed changes are minimal, private, and for a very small section of society; however, consequences of invasive species establishment and disease outbreak are community-based, widely dispersed, and ongoing. It is extremely unlikely that the benefits of allowing the import of psittacine birds outweighs the risks to Australian biosecurity, economy, and environments.

Due to these serious key omissions, we do not support the import of psittacine birds based on the evidence provided in the risk review.

The report does not provide sufficient transparency, nor evidence-based assessments of all benefits, risks, or associated costs, of allowing the import of psittacine birds. If the Department wishes to pursue this assessment, then future risk reviews must include the associated costs of facilitating new invasive species, and provide justification on the broader societal benefits of allowing import of psittacine birds.

It is our professional scientific opinion that the benefits of importing psittacine birds are outweighed by the significant damages caused by the potential introduction of new invasive species.

Key concern 1: Introduction of new invasive psittacine species

The risk review undermines current Australian biosecurity policies, which prioritise preventing the entry of new pests and diseases, including new invasive species. Despite current regulation of exotic pet trade and ban on imports, the domestic live pet trade is one of the main sources of new invasive birds in Australia, through accidental escapes or intentional releases of alien species [4]. Many invasive parrots are known to cause extensive crop damages and outcompete native birds for resources [5]. By allowing the legal private import of psittacine birds, the number of alien species incursions would increase, as will the potential for new invasive species to establish and spread [6, 7].

The risk review contains several management strategies of concern, which may assist regulation of disease, but do not address invasive species biosecurity nor management.

The risk review does not limit the number of imported aviary birds, which will cause inexpensive psittacine birds to be imported in potentially large numbers. Furthermore, there is no estimate on the number of psittacine birds which will be imported, and the capacity of (or the availability and pressure that this will place on) quarantine facilities. The potential risk of new invasive species scales with the number of species traded (propagule pressure), thus, as more individuals are imported, the risk of establishment and invasion increases [1, 6].

The risk review recognises "aviary birds", which we assume to be predominantly used for commercial breeding, pose a higher risk to Australian biosecurity than "household" birds. However, the identified management strategies are far more relaxed for aviary birds and are likely insufficient to prevent escapes and incursions. The risk review does not consider how the differentiation between "household" and "aviary" birds will be regulated. Depending on a given species, a bird may be considered as both, depending on the preference of the owner.

Key concern 2: Lack of transparency around costs and benefits of imports

As stated in the risk review, successive Australian Governments have maintained a conservative, but non-zero risk, approach to managing biosecurity risks. This position recognises that there are trade-offs associated with import policies, which are typically measured through a cost benefit analysis. It is a requirement for changes in Australian Government regulation to undergo a Regulation Impact Statement, including a cost benefit analysis, to transparently quantify the trade-offs between the risks and benefits. While we understand that this is not a requirement under the Biosecurity Bill, it is a necessary component of good policy decision-making.

By not providing a cost benefit analysis, the decisions outlined in this risk review do not provide the same transparency and evidence-based assessment as other reviews developed by the Department. Furthermore, this risk review does not consider the management steps and costs required in the event of disease outbreaks or alien species incursions. As described in the risk review, the majority of risks outlined do not have formal response arrangements in Australia.

The consequences of a biosecurity incursion due to these imports would be significant. The impacts would include the costs:

- associated with mitigating pathogen outbreaks
- to communities, industries and native ecosystems in the event of pathogen outbreak
- associated with damages by, and management of, alien species incursions
- associated with managing the risks of imports (e.g. quarantine)

It is equally important to consider the distributional consequences from the proposed imports of psittacine birds. The benefits of imports are private and shared amongst those who import, trade and keep birds, whereas the associated costs are shared across the general population and the environment. We do not believe that these distributional consequences have been reasonably calculated or communicated. We urge the Department to reject the proposal of the Review and to not permit the importation of live household pet and aviary psittacine birds to Australia.

References

- Lockwood, J.L., et al., When pets become pests: the role of the exotic pet trade in producing invasive vertebrate animals. Frontiers in Ecology and the Environment, 2019. 17(6): p. 323-330.
- 2. Vall-llosera, M., et al., *Improved surveillance for early detection of a potential invasive species:* the alien Rose-ringed parakeet Psittacula krameri in Australia. Biological Invasions, 2017. **19**(4): p. 1273-1284.
- 3. Hoffmann, B.D. and L.M. Broadhurst, *The economic cost of managing invasive species in Australia*. NeoBiota, 2016. **31**: p. 1.
- 4. Vall-llosera, M. and P. Cassey, Leaky doors: Private captivity as a prominent source of bird introductions in Australia. Plos One, 2017. **12**(2): p. e0172851.
- 5. Menchetti, M. and E. Mori, Worldwide impact of alien parrots (Aves Psittaciformes) on native biodiversity and environment: a review. Ethology Ecology & Evolution, 2014. **26**(2-3): p. 172-194.
- 6. Cassey, P., et al., Dissecting the null model for biological invasions: a meta-analysis of the propagule pressure effect. PLoS Biology, 2018. **16**(4): p. e2005987.
- 7. Cassey, P. and C.J. Hogg, *Escaping captivity: The biological invasion risk from vertebrate species in zoos.* Biological Conservation, 2015. **181**: p. 18-26.

Authors

We are grateful for the opportunity to provide our comments to the Department of Agriculture, Water and the Environment on the 'Import risk review for psittacine birds from all countries'. This submission was prepared by Ms Katherine Hill, Associate Professor Phill Cassey, Dr Oliver Stringham, and Mr Adam Toomes.

Katherine Hill is a PhD candidate in the Invasion Science and Wildlife Ecology group, within the School of Biological Sciences at the University of Adelaide. Katherine researches the Australian domestic online trade of psittacine birds, and is developing forensic technology to trace the captive and wild origins of Australian native parrots to aid in invasive species management.

Associate Professor Phill Cassey is Director of the University of Adelaide's Centre for Applied Conservation Science. He has twenty years' experience with invasive alien species and vertebrate pest management research, and has published over 200 scientific papers on the topic. He was previously the University of Adelaide project leader for the Invasive Animals CRC, and academic representative on the Intergovernmental Invasive Plants and Animals Committee 'Incursions' working group. Phill currently leads the Centre for Invasive Species Solutions project 'Understanding and intervening in illegal trade in non-native species'.

Dr. Oliver Stringham is a postdoctoral research associate at the University of Adelaide. He specialises in the trade of exotic pets and their associated biosecurity risks. His research explores the Internet as a conduit for wildlife trade and is developing automated technology to track illegal wildlife trade occurring online.

Adam Toomes is a PhD candidate in the Invasion Science and Wildlife Ecology group, within the School of Biological Sciences at the University of Adelaide. Adam investigates Australian seizures and online trade of non-native vertebrates in order to identify emergent trends relevant to biosecurity threats via invasive species.