

Special circumstances for granting licences to shoot flying-foxes

Commencing 1 July 2020

Introduction

The Department of Planning, Industry and Environment currently grants licences to commercial orchardists to shoot flying-foxes as a last resort and only where flying-foxes are impacting crop yield. These licences are a class of biodiversity conservation licence granted under the *Biodiversity Conservation Act 2016*.

An independent review was commissioned in 2008 to assess the validity of the NSW licensing policy for the legal harm (including killing) of flying-foxes. The key findings of the NSW Flying-fox Licensing Review Panel released in 2009 were that:

- the animal welfare issues arising from shooting flying-foxes are ethically and legally unacceptable
- shooting is ineffective at reducing crop damage when large numbers of flying-foxes visit orchards. Full exclusion netting provides the most effective protection against flying-fox damage
- the NSW fruit-growing industry could rely solely on exclusion netting as the means of flying-fox crop damage mitigation.

Since 1 July 2015, these licences have only been granted under special circumstances, subject to strict limits.

The Department will maintain a register of all licences granted under the *Biodiversity Conservation Act 2016* and will publish these on the [Department website](#).

Special circumstance conditions

From 1 July 2020, the Department only grants licences to shoot flying-foxes where it considers that flying-fox damage to orchards is the result of the following special circumstances:

- the orchard is established before 1 July 2011 (new orchardists should be aware of potential flying-fox impacts)
- flying-foxes are impacting on crop types never previously impacted in Australia
- there are topographical or physical constraints preventing the installation of exclusion netting
- there have been fewer than three licences granted for a particular orchard within the last 10 years.

These special circumstance conditions will expire on 30 June 2021. From 1 July 2021, licences to commercial orchardists to shoot flying-foxes will no longer be issued.

Definitions

Crop types never previously impacted in Australia exclude the following crop types below, for which there are existing reports that flying-foxes may feed on them.

Crop type	Scientific name	References
Peach, apricot, plum, nectarine, cherry, hybrids	<i>Prunus</i> spp.	Eby 1995, NPWS 1999
Apple	<i>Malus</i> spp.	Eby 1995, NPWS 1999
Pear, Australian paradise pear, nashi	<i>Pyrus</i> spp.	NPWS 1999, Ullio 2002
Banana	<i>Musa</i> spp.	Eby 1995, NPWS 1999
Grape	<i>Vitis</i> spp.	Eby 1995, NPWS 1999
Citrus	<i>Citrus</i> spp.	Eby 1995, Ullio 2002
Mulberry	<i>Morus</i> spp.	Eby 1995, NPWS 1999
Guava	<i>Psidium</i> spp.	Eby 1995, NPWS 1999
Avocado	<i>Persea americana</i>	NPWS 2001
Fig	<i>Ficus</i> spp.	NPWS 2000
Persimmon	<i>Diospyros</i> spp.	Eby 1995, NPWS 2002
Mango	<i>Mangifera</i> spp.	Eby 1995, NPWS 1999
Papaya	<i>Carica papyra</i>	Eby 1995, NPWS 1999
Loquat	<i>Eriobotrya japonica</i>	NPWS 1999
Lychee	<i>Litchi chinensis</i>	Eby 1995, NPWS 1999
Longan	<i>Dimocarpus longan</i>	Ullio 2002
Rambutan	<i>Nephelium lappaceum</i>	Ullio 2002
Custard apple	<i>Annona reticulata</i>	Eby 1995, Ullio 2002
Coffee	<i>Coffea</i> spp.	NPWS 2001, Waples 2002
Passionfruit	<i>Passiflora edulis</i>	DECC 2008
Jackfruit	<i>Artocarpus heterophyllus</i>	Lim <i>et al.</i> 1993
Breadfruit	<i>Artocarpus altilis</i>	Lim <i>et al.</i> 1993
Starapple	<i>Chrysophyllum cainito</i>	Lim <i>et al.</i> 1993
Hogs plum	<i>Spondias mombin</i>	Lim <i>et al.</i> 1993
Cashew	<i>Anacardium occidentale</i>	Lim <i>et al.</i> 1993
Sapodilla	<i>Manilkara zapota</i>	Lim <i>et al.</i> 1993
Peach palm	<i>Bactris gasipaes</i>	Lim <i>et al.</i> 1993
Waterapple	<i>Syzygium samarangense</i>	Lim <i>et al.</i> 1993

Topographical or physical constraints are situations where installing exclusion netting is not practical due to the following physical constraints. Applications claiming topographical constraints preventing exclusion netting are required to be supported by letters from two netting contractors and photographic evidence.

Constraint	Threshold for consideration
Steep slope	20° or more, or professional opinion of netting contractors
Obstructions from powerlines	Unable to achieve minimum clearance of 3 m between netting and overhead powerlines, or professional opinion of netting contractors
Obstructions from pipes and other infrastructure	Professional opinion of netting contractors

Procedure

- Orchardists will notify their local National Parks and Wildlife Service Area Office that fruit trees (including fruit and/or branches and twigs) have been damaged by flying-foxes. Orchardists will need to provide evidence of this damage.
- The Department may issue a shooting licence if there are reasonable grounds that meet the special circumstances outlined in this document.
- Orchardists may consider modifying orchards to resolve topographical or physical constraints that prevent installing exclusion netting.
- If a licence application is received for a crop type that has not previously been affected by flying-foxes, the crop type and date of application will be added to the above table and published on the Department website. The Department may grant a shooting licence to the orchardist for that crop type, as well as other orchardists who planted this crop type before it was added to the table.
- If a local council declines a development application for installing full exclusion netting, a letter from the council detailing the reasons must accompany the licence application.

References

Department of Environment and Climate Change (DECC) 2008, Best practice guidelines for the grey-headed flying-fox. Department of Environment and Climate Change, Sydney.

Eby P 1995, The biology and management of flying-foxes in NSW. Species Management Report No. 18. NSW National Parks and Wildlife Service, Sydney.

Lim TK, Bowman L and Tidemann S 1993, A report on the survey of winged vertebrate pest damage on crops in the Northern Territory. Technical Bulletin No. 209. Northern Territory Department of Primary Industries and Fisheries, Darwin.

National Parks and Wildlife Service (NPWS) 1999, Annual review of the *NPWS Policy on Flying-fox and Mitigation of Commercial Crop Damage* for the 1998-1999 fruit growing season. National Parks and Wildlife Service, Sydney.

National Parks and Wildlife Service (NPWS) 2000, Annual review of the *NPWS Policy on Flying-fox and Mitigation of Commercial Crop Damage* for the 1999-2000 fruit growing season. National Parks and Wildlife Service, Sydney.

National Parks and Wildlife Service (NPWS) 2001, Annual review of the *NPWS Policy on Flying-fox and Mitigation of Commercial Crop Damage* for the 2000-2001 fruit growing season. National Parks and Wildlife Service, Sydney.

National Parks and Wildlife Service (NPWS) 2002, Annual review of the *NPWS Policy on Flying-fox and Mitigation of Commercial Crop Damage* for the 2001-2002 fruit growing season. National Parks and Wildlife Service, Sydney.

Ullio L 2002, To net or not to net that is the question! But is it the answer? Pp. 70-76 in *Managing the Grey-headed Flying-fox as a Threatened Species in New South Wales*, edited by P Eby and D Lunney. Royal Zoological Society of New South Wales, Sydney.

Waples K 2002, Review of the NPWS policy on the mitigation of commercial crop damage by flying-foxes. Pp. 39-46 in *Managing the Grey-headed Flying-fox as a Threatened Species in New South Wales*, edited by P Eby and D Lunney. Royal Zoological Society of New South Wales, Sydney.

Department of Planning, Industry and Environment, Locked Bag 5022, Parramatta NSW 2124.
Phone: 1300 361 967 (environment and national parks enquiries); email:
info@environment.nsw.gov.au; website: www.environment.nsw.gov.au.
ISBN 978-1-922431-38-7; EES 2020/0266 July 2020..