A statement for the purposes of approved conservation advice (\$266B of the *Environment Protection and Biodiversity Conservation Act 1999*)

<u>Approved Conservation Advice for</u> <u>Perameles gunnii gunnii (Eastern Barred Bandicoot (Tasmania))</u>

This Conservation Advice has been developed based on the best available information at the time this conservation advice was approved.

Description

Perameles gunnii gunnii, Family Peramelidae, commonly known as the Eastern Barred Bandicoot (Tasmania), is a yellowish-brown marsupial with three to four distinctive pale bars on its hindquarters. It grows up to 35 cm long and can weigh up to 1450 g. This bandicoot has large pointed ears and a tail which grows to 9.5 cm long.

Conservation Status

The Eastern Barred Bandicoot (Tasmania) is listed as **vulnerable**. This species is eligible for listing under the *Environment Protection and Biodiversity Conservation Act 1999* (Cwlth) (EPBC Act) as, prior to the commencement of the EPBC Act, it was listed as vulnerable under Schedule 1 of the *Endangered Species Protection Act 1992* (Cwlth). The Eastern Barred Bandicoot (Tasmania) is also listed under the *Threatened Species Protection Act 1995* (Tasmania).

Distribution and Habitat

The Eastern Barred Bandicoot (Tasmania) was previously widely distributed in northern, central and south-eastern Tasmania (Rounsevell et al., 1991), within the North West, North and South (Tasmania) Natural Resource Management Regions. However, it has now declined in the central part of this range in the midlands region (Hocking, 1990; Robinson et al., 1991; Mallick et al., 1998). The species is now most abundant in the south-eastern quarter of the state with lower numbers in the north-eastern and north-western coastal regions and least abundant in the midland and eastern coastal areas (Hocking, 1990; Mallick et al., 1997).

The Eastern Barred Bandicoot (Tasmania) occurs in open habitats including woodlands and open forests with a grassy understorey, and native and exotic grasslands (Hocking, 1990). It needs understorey plants to provide shelter, nest sites and food (Parks and Wildlife Service Tasmania, 2007).

The distribution of this species overlaps with the 'Eucalyptus ovata-Callitris oblonga Forest' EPBC Act-listed threatened ecological community.

Threats

The main identified threats to the Eastern Barred Bandicoot (Tasmania) include clearing of habitat, in particular loss of ground cover, and predation by feral cats (*Felis catus*) and dogs (*Canis familiaris*) (Hocking, 1990; Driessen et al., 1996; Parks and Wildlife Service Tasmania, 2007). Cats are also the primary host of *Toxoplasma gondii*, a highly contagious parasite which can cause death in Bandicoots (Obendorf & Munday, 1990; Obendorf et al., 1996). Security is considered poor, given that few reserves are known to contain the Eastern Barred Bandicoot (Tasmania) (Hocking, 1990) and most of the available habitat is on productive agricultural or other private land (Driessen et al., 1996). Overgrazing and urban development also represent pressure on the Eastern Barred Bandicoot's habitat and the presence of foxes (*Vulpes vulpes*) in Tasmania also represents a new predation threat.

This conservation advice was approved by the Minister / Delegate of the Minister on: 26/3/2008

Research Priorities

Research priorities that would inform future regional and local priority actions include:

- Design and implement a monitoring program.
- More precisely assess population size, distribution, ecological requirements and the relative impacts of threatening processes.

Regional Priority Actions

The following regional priority recovery and threat abatement actions can be done to support the recovery of the Eastern Barred Bandicoot (Tasmania).

Habitat Loss, Disturbance and Modification

- Identify populations of high conservation priority.
- Manage threats to areas of vegetation which may provide habitat for the Eastern Barred Bandicoot (Tasmania).
- Encourage landowners to retain or replant native vegetation, avoid overgrazing and not slash or burn areas where bandicoots occur.
- Investigate formal conservation arrangements, such as covenants or inclusion in reserve tenure.

Animal Predation or Competition

- Develop and implement a management plan for the control and eradication of feral cats and dogs in the local region.
- Encourage responsible cat ownership, including night curfews for cats.

Diseases, Fungi and Parasites

• Develop and implement suitable hygiene protocols to protect against outbreaks of *Toxoplasma gondii* parasite.

Conservation Information

• Raise awareness of the species within the local community, including land and pet owners.

Enable Recovery of Additional Sites and/or Populations

• Investigate options for linking, enhancing or establishing additional populations.

Local Priority Actions

The following local priority recovery and threat abatement actions can be done to support the recovery of the Eastern Barred Bandicoot (Tasmania).

Habitat Loss, Disturbance and Modification

- Monitor known populations to identify key threats.
- Monitor the progress of recovery, including the effectiveness of management actions and the need to adapt them if necessary.
- Undertake survey work in suitable habitat and potential habitat to locate any additional populations/occurrences.
- Minimise adverse impacts from land use at known sites.
- Protect populations through the development of conservation agreements and/or covenants.

Animal Predation or Competition

- Manage threats at known sites in reserve areas and on private property to control and exclude feral cats, dogs and foxes.
- Continue baiting to control population numbers of feral animals.

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Diseases, Fungi and Parasites

• Implement suitable hygiene protocols to protect against outbreaks of *Toxoplasma gondii* parasite.

This list does not necessarily encompass all actions that may be of benefit to the Eastern Barred Bandicoot (Tasmania), but highlights those that are considered to be of highest priority at the time of preparing the conservation advice.

Existing Plans/Management Prescriptions that are Relevant to the Species

- Threat Abatement Plan for Predation by European Red Fox (EA, 1999a), and
- Threat Abatement Plan for Predation by Feral Cats (EA, 1999b).

Information Sources:

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