Dr Vanessa Standing MVSc
[redacted]
Kempsey
NSW 2440

[redacted]

[redacted]

August 24, 2012

For the Attention of the Minister for the Environment and the Minister for Primary Industry

Re: Native Vegetation Regulation Review: Private Native Forestry and Koalas

Office of Environment and Heritage
Level 12, PO Box A290
Sydney South NSW 1232

Dear Ministers,
I have read with interest the discussion paper on the Review of the Native Vegetation Regulation discussing the Code of Practice for Private Native Forestry and Koalas.
There are now lots of studies on the ecology of koalas. The first studies (Eberhard, 1972) showed that koalas like large trees which provide them with a good food source, adequate moisture in the leaves and shelter. Koalas have evolved as sedentary, solitary animals because of the low nutritional value of their diet. One koala would use several trees of certain species and their average home range was 1hectare. Koalas did not share trees, they had security of tenure of their trees throughout their life and they did not move between trees as often.
More recent studies have shown that koalas are exhibiting adaptive behaviours because of the depletion of their habitat. Home ranges are much larger, regrowth trees do not provide adequate nutrition because it is mostly secondary habitat and therefore koalas are moving between trees more, putting them at greater risk of predation and road kill and browsing in trees which are not their preferred species. They spend less time in a tree and therefore leave fewer scats beneath. They may be browsing trees and not leaving any scats. They are often found in non- food trees during the day because there are too few large trees to provide them with shelter.
These adaptive behavioural changes challenge the effectiveness of regulations such as SEPP44 and hence the PNF Code of Practice, particularly the definition of Core Koala Habitat and also the methodology of surveys.

The present PNF Code of Practice and prescriptions are not working, are not protecting koalas and need to be changed. Property Vegetation Plans (PVPs) are still being issued for Core Koala Habitat and Core Koala Habitat is still being logged.
Koala Plans of Management prepared by several Local Governments (under SEPP44) which identify and map koala habitat are being ignored by forestry managers because PNF PVPs under the Native Vegetation Act 2003 are not required to consider SEPP44 and are therefore not required to consider KPoMs. This is clearly contrary to the protection and recover of koala populations. If PNF managers are not required to

consider SEPP44 why is the SEPP44 definition of core koala habitat being used in the Code of Practice for koalas?

The PNF Code of Practice and prescriptions for the Koala are inadequate, unscientific and ecologically illogical.

Prescription (a) states forest operations are not permitted within any area identified as core koala habitat within the meaning of SEPP44.

Prescription (b) then says if a koala is in a tree or scats are found beneath a tree then the trees must be retained with an exclusion zone.

This contradicts (a) because if a koala is found in a tree and there are scats under the trees then **this is core koala habitat according to the definition and should not be logged at all.**

Similarly with prescription (c), where there is a record of a koala or scats are found within an area of forest operations or 500 metres of forest operations- this means it is **core koala habitat and should not be logged at all.**

I have discussed this with the local OEH PNF staff and they tell me that one koala sighting, scats or record does not mean core koala habitat. This is nonsense. Every individual koala is part of a breeding population and therefore is within core koala habitat. Even sub-dominant males are part of a population. They are like the reserves in a sports team sitting on the bench waiting for their time The excuse of "transient" koalas, "just a wandering male" etc and dismissing them as irrelevant is unscientific and contrary to the protection and recovery of koala populations.

Selection of trees to be retained. (Prescription c)

Koalas are very selective in choosing their food trees. Analysis of tree use by koalas shows koalas prefer certain species over others but they are also selective about individual trees of their preferred species. i.e. they will not eat all Tallowwoods, it depends on the location, soil moisture and nutrients and the levels of toxic compounds in the leaves. So random selection of retained trees by landholders or logging contractors (or forestry officers in SF) is not sufficient to protect koalas.

In the past when I was more optimistic I thought science and technology would solve this problem of identifying a koala food tree. Hume (1999) studied the nutrition of koalas and found water and nitrogen were determining factors in the koala's selection of eucalyptus leaves. However the role of plant chemicals known as formyl phloroglucinol compounds (FPC's) are now also considered an important determinant in the selection of food trees by koalas and possums.(Lawler et al,2000)

Thus who has the expertise to select trees for retention? I had envisaged that scientific research would progress from these studies and provide a simple field technique for analysing and assessing eucalyptus trees for potential koala food trees. However at this time, only a koala can recognise a good food tree. Koala experts can have an educated guess but most landholders and logging contractors are certainly not qualified to do this.

The numbers. Why 20 scats? This means a tree with only 15scats can be felled, but whose counting anyway. I do not think there are many landholders or contractors rummaging around in the leaf litter beneath all the trees they are planning to fell.

Just one scat is significant; one scat indicates the presence of a koala in the area and is therefore core koala habitat.

The NSW Wildlife Atlas. PVPs also rely on the NSW Wildlife Atlas for records of sightings. This is not a comprehensive data base and I have sent records in only to find the area of the sighting logged in the following months.

No record does not mean no koala

Koalas are not easy to find and as there numbers have declined they are even harder to find. A greater survey effort is required now and this is not cost effective.

The happiest healthiest koalas are the ones unseen and undisturbed and mapping core koala habitat is actually making koalas more vulnerable.

I have considered the options suggested in the Discussion paper: Private Native Forestry and Koalas
Option (a).To do nothing and make no changes to the PNF Code of Practice would be negligent and contrary to the NSW Recovery Plan for the Koala and the listing of the koala as endangered under the EPBC Act
Option (b) PNF prohibited in certain mapping categories of an approved KPOM and restricted in other categories.
This is my preferred option. The Kempsey CKPoM has defined and mapped Koala Management Areas and all logging should be prohibited from these areas.
For this option to be effective, Prescription (a) in the PNF CoP for Koala (p.26) should be amended by replacing 'core koala habitat' with "Koala Management Area'
Prescriptions (b) and (c) still apply to forest operations outside KMAs with these amendments
Prescription (b), the "20 or more koala faecal pellets (scats)" should be changed to "1 or more koala faecal pellets"
The advantage of Koala Management Areas is they encompass all types of koala habitat definitions and there is no need for validation of the presence of koalas. They are defined as areas with koala activity associated with primary and secondary habitat. Local governments which already have KPoMs will have no trouble defining KMAs if they haven't already and Councils in the process of preparing a KPoM can map KMAs
The disadvantage is that not all LGA's on Schedule 1 of SEPP44 have a KPOM and therefore no mapping of koala habitat. This should be addressed with the new standard Local Environment Plans.
The other disadvantage as stated in the discussion paper is that logging will be prohibited in areas of little value to koalas. I believe these areas will be small compared with the advantage of protecting more koala habitat from disturbance.

I have prepared a list of recommendations for your consideration to help the koalas recover and to assist landholders

- **An immediate and absolute Moratorium on the felling of koala food tree species anywhere, no exceptions, no exemptions** This would apply on public (State Forests and Crown land and, of course, NPs and NRs) and private land and RAMAS should not be exempt. It would apply to the primary and secondary preferred koala food tree species in each region. This would be easier to enforce and high penalties can be imposed on mill owners, logging contractors and landowners who breach. The moratorium should stay in place until all local government areas with koala populations have mapped all their koala habitat and have defined Koala Management Areas.

- **The Native Vegetation Act 2003 must be amended so that assessments of PNF PVPs are required to consider and comply with SEPP44 and Koala Plans of Management. The PNF Code of Practice must also recognise and adhere to Local Government KPoMs. Landholders should attain dual consent from OEH and Councils for all harvesting operations so that compliance is ensured. An independent authority should investigate and prosecute breaches.**

- **Timber harvesting in any identified koala habitat should be prohibited.** (All definitions of koala habitat apply (i.e. core, potential, primary, secondary, preferred, koala management areas, etc). Koala Plans of Management must be consulted and complied with.
- **The Regional Forest Agreements should be torn up and not renewed.** The agreements were about promising the timber industry a timber supply providing harvesting was done in an ecologically sustainable way. This has not happened. Timber quotas are unachievable. Illegal logging is occurring and nothing appears to be done about it.

- **The timber industry urgently needs a major restructure** Similar to fishing industry. Resources are being depleted, and there are too many operators. Fewer licences should be issued and the bad operators who breach regulations must go. I have been told that all the logging contractors in my area have had complaints against them for breaching the regulations. Some don't have a licence but still keep going. They ignore the regulations and prescriptions because the risk is worth it.
- **Accreditation of logging contractors and timber cutters.** There seems to be many cowboys and rogues in the timber industry who are dishonest, unethical and who flout the law. Education, qualifications and accreditation will help but getting rid of the rogues should be a priority.
- **More native vegetation compliance officers.** Less than 20% of PVPs are audited and harvesting operations are not monitored because landholders don't have to say when they are logging. Broad-scale land clearing may have stopped but there is still a net loss of native vegetation and biodiversity.
- **Higher penalties and on the spot fines for breaches of the regulations and Code of Practice.** Logging in koala habitat which removes koala food and shelter trees will cause harm and premature death of koalas and therefore should be prosecuted under the National Parks &Wildlife Act, the Threatened Species Act, the EPBC Act and/or the Cruelty to Animals Act. Koalas don't just "move on" somewhere else and live happily ever after- **they die!**
- **Landholders should be rewarded for not disturbing koala habitat** i.e. paid, compensated or some other incentive. The cost of this policy could be paid by the timber industry from funds collected from a levy imposed on mill operators and logging contractors or from the Federal Biodiversity Fund.
- **Landholders should also be encouraged to improve the biodiversity** of their forested areas by fencing to control stock, planting koala food trees and other local native species and removal of dense stands of weeds like lantana.

Koalas have been on the Threatened Species (vulnerable) list in NSW since 1995 and now are on the Federal EPBC Act Endangered list. It is time for a genuine effort from both Federal and State governments to rescue the koala populations along eastern NSW. Koalas are disappearing from the Macleay Valley. I am monitoring the local extinctions. I believe koala populations can still recover if their food trees and habitat are protected from disturbance, **NOW.**

Your government promised better protection for koalas. This is an opportunity to act.

Yours faithfully
Vanessa Standing

References

Eberhard, I.H. Ecology of the Koala. Phascolarctos cinereus (Goldfuss) on Flinders Case. Kangaroo Island. Ph.D Thesis. University of Adelaide.
Hume, I.D.1999 Marsupial Nutrition
Lunney,D. Matthews,A,.Moon,C. and Ferrier,S. 2000a "Incorporating habitat mapping into practical koala conservation on private lands" Conservation Biology 14(3):669-680
Lunney,D. O'Neill,L. Matthews,A. and Sherwin,W.B. 2002 " Modelling mammalian extinction and forecasting recovery: koalas at Iluka (NSW ,Australia) Biological Conservation 106:101-113
Lawler, I.R. Foley W.J. and Eschler,B.M. 2000 "Foliar concentration of a single toxin creates habitat patchiness for a marsupial folivore" Ecology 81:1327-1338
Lawler, I.R, Foley W.J., Eschler, B.M, Pass, D.M. and Handasyde,K. 1998" Intraspecific variation in Eucalyptus secondary metabolites determines food intake by folivorous marsupials. Oecologica 116:160-169
McAlpine, C.A.Rhodes,JR., Callaghan,JG, Bowen,ME, Lunney,D. Mitchell, DI, Pullar,DV and Possingham,HP 2006b "The importance of forest area and configuration relative to local habitat factors for conserving forest mammals: A case study of koalas in Queensland, Australia" Biological Conservation 132:153-165
NSW Recovery Plan for the Koala 2008. Department for the Environment.
Phillips, S.S. 2000b The Tree Species Preferences of the Koala as a basis for the delineation of Management Areas for Recovery Planning in NSW. Unpublished report for the NSW Koala Recovery Plan
Reed,.P.C., Lunney,D and Walker,P.(1990) A 1986-1987 survey of the koala in NSW and an ecological interpretation of its distribution. Biology of the Koala Pp55-74 Lee, AK, Handasyde, KA and Sanson, GD (eds.)

Cc Mr Tony Burke. Federal Minister for the Environment
Andrew Stoner. NSW Deputy Premier

++++++++++++++