



NSW Biodiversity Offsets Policy for Major Projects

Fact sheet: Mine site rehabilitation

Introduction

The NSW Biodiversity Offsets Policy for Major Projects (the policy) is being introduced to clarify, standardise and improve biodiversity offsetting for major project approvals under the NSW planning system.

This fact sheet explains ways in which rehabilitation of a mine site after mining has been undertaken can contribute to fulfilling an offset requirement for a major project.

What rehabilitation means

The policy allows the ecological rehabilitation of a mine site to be considered as an offset where there are good prospects of restoring biodiversity on that land. This means the objective of the proposed rehabilitation actions must be ecological restoration, that is, restoring the site as far as possible to its previous ecological state or improving its previous ecological state.

Note that the rehabilitation that can count to meeting an offset is ecological rehabilitation of a mine site immediately post mining as part of a company's conditions of planning consent and mining licence conditions. Rehabilitation of derelict mine sites, which are former mining sites requiring rehabilitation where no individual or company can be held responsible for their management or rehabilitation, can only be undertaken as a supplementary measure

Supplementary measures can only be undertaken when offsets are not available and the hierarchy of supplementary measures has been applied. For more information on rehabilitating derelict mine sites as a supplementary measure, see Appendix 1 of the policy (visit www.environment.nsw.gov.au/biodivoffsets/1480biofpolmp.htm).

How rehabilitation works

Under the policy, proponents will have two options for calculating the contribution of mine site rehabilitation to their offset requirement. Both options recognise there is more risk in doing this than in improving biodiversity on undisturbed land. These options are:

- **option 1 – two-stage model:** under this option, proponents will receive upfront biodiversity credits for the initial stage of rehabilitation. Beyond this, they will need to set up a biobank site on the land to generate credits that can be sold or used in the future.
- **option 2 – deferred retirement arrangement:** proponents will purchase all biodiversity credits they need to offset their development upfront. Credits will be refunded on successful completion of the ecological rehabilitation.

Option 1: Two-stage model

The process for assessing the gain in biodiversity values achieved through rehabilitation takes place in two stages:

Stage 1 – Initial rehabilitation

Biodiversity credits can be created for works undertaken to establish native vegetation that represents a recognisable and self-sustainable plant community. Proponents will be required to

provide a bond for security of the rehabilitation works (as is current practice for securing mine rehabilitation works).

Only biodiversity credits generated in this stage can count to a proponent's immediate offset requirement. This process will be managed in accordance with the Framework for Biodiversity Assessment and conditions of the project approval and mining licence.

Credits generated in Stage 1 are calculated slightly differently to those generated at a biobank site. For example, the consideration of landscape context, e.g. whether the site will contribute to a biodiversity corridor or the patch size of the vegetation, is not undertaken in Stage 1. Furthermore, increases in biodiversity value expected to be achieved through management actions are more limited than the increases expected at a typical offset site. This is because many ecological processes essential for ecosystem function are present at a typical biobank site, whereas all ecological processes on a mine site need to be recreated after mining. Consequently, the outcomes of ecological rehabilitation tend to be more uncertain and carry greater risk.

Stage 2 – Subsequent rehabilitation

Once a self-sustaining plant community type has been successfully established, additional biodiversity credits can be generated for the ongoing management of the area to ensure its biodiversity values are continually improved. A biobanking agreement is used to secure the ongoing management of the site and credits are calculated in the same way as for an offset site. For example, consideration of landscape values is included in this calculation. The proponent may use these credits to offset a future development, or sell them to offset other developments.

The two-staged approach manages the greater risks associated with offsetting through rehabilitation, including the longer timeframes and the considerable uncertainty around whether a self-sustaining plant community can be re-established.

Option 2: Deferred retirement arrangement

Under this option, the proponent can nominate the type of biodiversity and its condition that will be re-established on the site through rehabilitation. This is expressed as a number and type of biodiversity credits.

The proponent needs to purchase these biodiversity credits as part of fulfilling their offset requirement, but these credits are held by the Minister for the Environment, and not retired.

These credits are refunded to the proponent as they restore the site in accordance with the proponent's plan and to the satisfaction of the Chief Executive, Office of Environment and Heritage. The proponent can then either sell the credits or use them to offset a future development.

This arrangement is set out under sections 89I (for state significant development) and 115ZC (for state significant infrastructure) of the *Environmental Planning and Assessment Act 1979* and section 127ZT of the *Threatened Species Conservation Act 1995*. This arrangement is not limited to mine sites and can be used for rehabilitation of any degraded land.

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