



**NSW
Resources
Regulator**

Exploration and Mining Rehabilitation Report

1 JANUARY 2021 – 30 JUNE 2021



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NSW mine rehabilitation overview

1 January to 30 June 2021

We conduct compliance and enforcement activities under the **Mining Act**, with a focus on **mine rehabilitation**.



2,156 current mining titles (as at 30/6/2021)


572
COAL


1,584
MINERALS

3,337 current small scale titles (as at 30/6/2021)


3,184
LIGHTNING RIDGE


153
WHITE CLIFFS

Source: Titles Administration System (TAS) generated 30/6/2021
Petroleum titles excluded

Source: Opal Claims System (OCS) generated 30/6/2021

Our compliance priorities activity

From 1 January to 30 June 2021, our compliance priorities were:


Progressive rehabilitation


Landform establishment

92 Site assessments conducted

1 Notice issued

Engaging with industry


1,612
newsletter subscribers


3
industry publications


6
audit reports

NSW mine rehabilitation overview

1 January to 30 June 2021

Mining Act activity

62 
Mining Act compliance concern
 allegations received

116 
Mining Act compliance concern
 potential breaches alleged

124 
Mining Act compliance concern
 breaches sustained

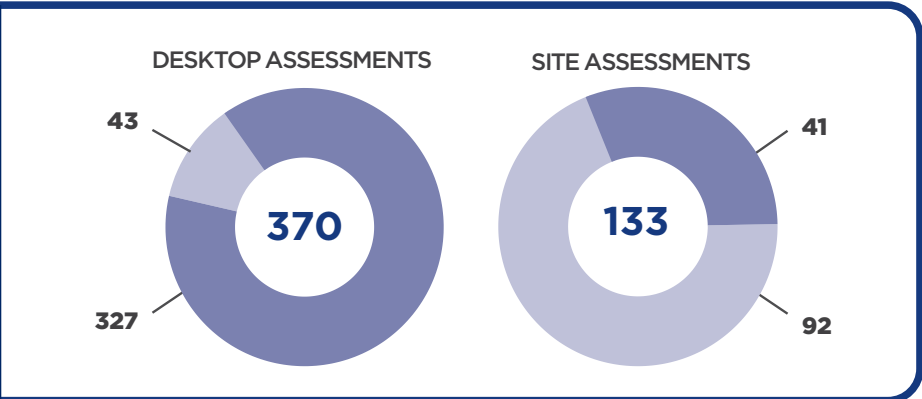

1,776
Mining Act requests for service
 actioned

155 **Mine rehabilitation security deposit reviews** conducted

Nearly **\$3.4 billion*** is held in security bonds for rehabilitation of exploration and mining impacts 

503
Mining Act assessments
 conducted

-  Proactive
-  Reactive

Our enforcement actions

Issued **14**
notices of directions
 (s240)

Issued **3**
prohibition notices
 (s240A)

Issued **86**
official cautions

Issued **12**
penalty notices

2
enforceable undertakings accepted

1
cancellation of title

*Only current titles as at end of June 2021. Sourced from the Titles Administration System as of 30 June 2021.

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Important Updates

The following highlights occurred during the reporting period.

Operational rehabilitation reforms

The operational rehabilitation reforms were finalised during the reporting period, with the amendment Mining Regulation commencing on 2 July 2021.

The reforms aim to improve compliance and reporting requirements for rehabilitation through an amendment to the Mining Regulation 2016, which prescribes new standard mining lease conditions relating to rehabilitation and sets clear, achievable and enforceable requirements for rehabilitation.

The new standards conditions will apply to all new mining leases granted from 2 July 2021 while large existing mines will have 12 months to comply with the changes and small existing mines will have 24 months to transition to the arrangements.

The new changes will require mining lease holders to:

- prepare a management plan to identify and achieve rehabilitation outcomes
- carry out rehabilitation risk assessments
- develop a program to demonstrate an approach to progressive rehabilitation
- make information about rehabilitation publicly available
- report annually on rehabilitation performance.

New guidance material including [six guidelines](#), [frequently asked questions](#), a [summary of the new obligations](#), a [fact sheet about the new conditions](#) and a [fact sheet about transitioning to the new conditions](#) has been published on our [website](#) to assist lease holders understand and meet their obligations.

Reforms - Public consultation

Between 19 March and 30 April 2021, we sought feedback on six guidelines developed to support the new rehabilitation standard conditions and associated requirements. These guidelines are intended to help the leaseholder comply with the conditions and do not contain any additional mandatory requirements.

The following guidelines were made available for comment:

- Guideline 1: Rehabilitation risk assessment
- Guideline 2: Rehabilitation records
- Guideline 3: Rehabilitation controls
- Guideline 4: Mine rehabilitation portal
- Guideline 5: Rehabilitation objectives and rehabilitation completion criteria
- Guideline 6: Achieving Rehabilitation Completion (sign-off)

A public consultation forum was held on 21 April 2021. [Click here to watch a recording of the session \(YouTube\)](#).

Find out more about the [Operational Rehabilitation Reforms consultation](#).

New dedicated website section for opal mining

A key component of our compliance priorities is to deliver a diverse range of reforms and improvement measures to strengthen the regulation of opal mining. Opal miners can now access all information relating to opal mining and prospecting from a new dedicated section on our website. This improvement aims to ensure ease of access to opal mining guidance materials and resources.

Visit the new [opal mining web page](#).

Inaugural opal mining compliance priorities released

The [Opal mining compliance priorities report](#) set out our key compliance priorities for opal mining for 2021. The report also outlines our focus on reforms and improvement measures within the Lightning Ridge Mineral Claims District including guidance material, training and the regulatory policy framework.

View the [opal mining compliance priorities report](#).

New online forms



There have been some notable additions and enhancements to the Regulator Portal, with the following forms now available: [New Mining Act forms now online](#)

Rehabilitation Completion / Annual Report form updates

There have been several updates to forms to improve usability for title holders, including the ability to:

- lodge *Rehabilitation Completion* applications with or without an accompanying rehabilitation cost estimate
- submit annual *Environmental and Rehabilitation Compliance Reports*, separately or as part of a Rehabilitation Completion application
- lodge no surface disturbance *Rehabilitation Completion* applications for dead titles
- lodge *Rehabilitation Cost Estimate submission form* on its own, not just part of an application
- self-report non-compliances as required

More online forms will continue to be added to the [Regulator Portal](#) throughout 2021.

Audits

We undertake compliance audits of mining operations and exploration activities to assess whether title holders are complying with specific requirements under the *Mining Act 1992*. The audits also examine the operational performance of mining operations in achieving sustainable and safe operations.

Compliance audit reports completed and published during the reporting period are listed below.

COMPLIANCE AUDIT REPORT	DATE PUBLISHED	LOCATION
EL8867 Freeport-McMoRan Exploration Australia Pty Ltd	March 2021	Cootamundra
EL8622 TRK Resources Ltd	March 2021	Gundagai
EL6695 Peel Mining Pty Ltd	March 2021	Mount Hope
E7390 Impact Minerals	March 2021	Broken Hill
EL7805 Flemington Mining Operations Pty Ltd	June 2021	Fifield
EL9040 Stockton sand exploration project	June 2021	Stockton

Audit learnings

Good practice:

- preparing a detailed prospecting plan with a land access agreement to provide landowners with a good understanding of activities proposed on their land
- negotiating new access agreements specifically for each exploration program, rather than having the open-ended agreement that is typically in place
- implementing vehicle hygiene procedures to minimise the spread of weeds between properties
- undertaking a comprehensive and robust environmental risk assessment, including identification of risk controls, and monitoring of those controls to confirm effectiveness.

Areas for improvement:

- failure to submit rehabilitation objectives and completion criteria
- failure to have a documented community consultation strategy
- failure to undertake exploration drilling in accordance with the exploration activity approval
- poor chemical storage, bunding and spill management
- poor inspection and monitoring processes
- poor management of subcontractors (e.g. drillers).

Rehabilitation

We are responsible for regulating rehabilitation under the *Mining Act 1992* and the conditions of the relevant exploration licences and mining lease.

Rehabilitation is the treatment or management of land or water that has been disturbed by exploration or mining to ensure a safe and stable environment. Rehabilitation must achieve a final outcome as required by the development consent of a mine, which may include but is not limited to the re-establishment of native ecosystems, agriculture and a variety of rural, urban and industrial land uses.

A range of regulatory tools are utilised to ensure rehabilitation is undertaken in a timely manner and in accordance with approved commitments. This includes being able to direct a former holder of an exploration licence or mining lease to complete rehabilitation works even after a mining title has been relinquished.

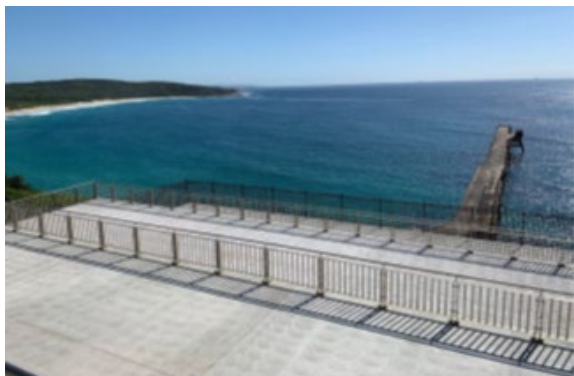
Rehabilitation Information Releases

Rehabilitation Information Releases (RIRs) are published to highlight rehabilitation outcomes, initiatives and learnings at NSW mines sites.

There were two Rehabilitation Information Releases published between January-June 2021. A summary of these are included below.

Rehabilitation Information Releases are published on our [website](#).

Catherine Hill Bay coal preparation plant and coal bin rehabilitation achieves residential, recreation and open space land uses



In June 2021, we approved the successful completion of rehabilitation on part of Consolidated Coal Lease 706 (CCL706) (1973) held over the former Catherine Hill Bay coal preparation plant, coal bin, and coal stockpile areas. The domain where rehabilitation has now been completed comprises around nine hectares and include the capping of the former coal loading bins.

Read the full rehabilitation information release [RIR21-01](#).

Rehabilitation of Western Emplacement Area at Ravensworth Operations

In response to significant soil erosion observed by the Regulator at a waste rock emplacement, at the Ravensworth Operations open cut coal mine, extensive rehabilitation improvements have been implemented. As part of the ongoing and progressive program of rehabilitation works, the mine operator has implemented significant improvements to its design, construction, and monitoring of final landforms.



Before – erosion rilling, gullies and bare patches in established rehabilitation



After – backfilling gullies and gills. New vegetation established.

Read the full rehabilitation information release [RIR21-02](#).

Rehabilitation security deposits

All exploration and mining title holders are required to lodge a security deposit that covers the full rehabilitation costs. Currently, the NSW Government holds nearly **\$3.4 billion** in security bonds for rehabilitation of exploration and mining impacts.

We regularly assess the surface disturbance (or proposed disturbance) of a mine or exploration site to calculate the security deposit, this is known as the assessed deposit. Before partial or full security bonds are returned, evidence must be provided to demonstrate rehabilitation objectives have been met and final approved landform have been implemented.

The full list of recently reviewed assessed deposits determined by the Regulator can be viewed in the [Assessed deposits table](#).

Compliance and enforcement

The Resources Regulator has a risk-based and outcomes-focused approach to compliance and enforcement. While the laws we administer set minimum standards that industry must adhere to, we seek to encourage a positive compliance culture where industry demonstrate best practice by actively adopting measures and practices over and above legislative requirements.

Compliance priorities

Our targeted proactive assessments between January and June 2021 were undertaken in line with our compliance priorities at identified sites, following a risk profiling review. The assessments focused on the design and construction of final landform rehabilitation. The program included announced and unannounced inspections.

Good practice examples identified during the program will be shared through industry workshops and publications.

The following compliance priorities were set for the period January–June 2021.

Operational rehabilitation reforms

Sector: All mining leases

Period: March–June 2021

We are improving compliance and reporting requirements for rehabilitation through the development of a new regulation under the *Mining Act 1992*, which will replace mining lease conditions relating to rehabilitation and set clear, achievable, and enforceable requirements for rehabilitation. This will ensure progressive rehabilitation occurs and sustainable post-mining land use outcomes are achieved.

Refer to the [latest updates](#) section for more information on the operational rehabilitation reforms.

Progressive rehabilitation

Sector: Mining leases

Period: January–June 2021

Progressive rehabilitation ensures that areas disturbed by mining operations are returned to a condition capable of achieving the final land use. Until the implementation under the operational rehabilitation reforms, title holders of mine sites are required to undertake progressive rehabilitation in accordance with an approved mining operations plan. A key component of the mining operations plan is to ensure rehabilitation planning and practices are integrated throughout all phases of mining.

The program focused on how mine sites are designing and constructing final landforms to achieve sustainable rehabilitation outcomes. Targeted assessments were undertaken following a risk profiling review. The assessments included announced inspections and captured ‘high risk’ sites. The objectives of these targeted assessments ensured:

- the range of short to long-term risks associated with the establishment of final landforms are identified and appropriate controls are in place to facilitate

sustainable rehabilitation outcomes

- the selective handling and management of mine materials (e.g. overburden, tailings, reject materials) to address potential geochemical and geotechnical constraints for rehabilitation in the final landform
- emplacement areas are designed and constructed to achieve a long-term stable landform, based on appropriate hydrological and geomorphic assessments
- that potentially adverse waste or reject material are effectively encapsulated within the final landform
- that a sufficient quantity, of an appropriate material, required to cover waste rock dumps and tailings management facilities, is available to achieve effective rehabilitation outcomes
- that landform construction is executed in accordance with the design and validated by suitably qualified and experienced personnel
- control measures are validated via monitoring and inspections are recorded to enable short to long term risks to be appropriately addressed
- the mine site has engaged the appropriate skills and experience in relation to landform design and construction
- rehabilitation is integrated into mine planning systems.

Reports on compliance activities and programs, targeted assessment programs and compliance auditing can be found on our [compliance activities and reports web page](#).

Compliance priorities – Opal sector

The following six compliance priorities were identified as the focus of our targeted assessment program within the Lightning Ridge and White Cliffs opal mining areas from January to December 2021:

- rehabilitation (March–September 2021)
- mullock and soil management (March–September 2021)
- waste materials and site management (March–September 2021).

Outcome details and findings will be published on the Resources Regulator’s website at the completion of the program of works.

Additional information regarding compliance and enforcement activities, priorities, outcomes are published in our [monthly business activity reports](#).



Mining Act statutory decisions

NAME(S) OF PARTIES	DECISION	REASON	DATE OF DECISION
<p>Exploration Licences 8308, 8309, 8310, 8311, 8312, 8385, 8560, 8648, 8769 and 8865 (Act 1992)</p> <p>RZ Resources Ltd (formerly Relentless Resources Limited)</p>	<p>Decision to vary (attach) Mandatory Audit Conditions.</p> <p>This decision takes effect on 24 May 2021.</p> <p>Clause 12 of Schedule 1B of the <i>Mining Act 1992</i>.</p> <p>Decision document - Variation of authorisation</p>	<p>Alleged contraventions of the <i>Mining Act 1992</i>.</p>	20 May 2021
<p>Exploration Licence 8967 (Act 1992) - Mr Kris Hetherington (licence holder)</p>	<p>Cancelled.</p> <p>Exploration Licence No. 8967 (Act 1992) (EL 8967) under Section 125 of the <i>Mining Act 1992</i> (Mining Act).</p> <p>This decision takes effect on 17 May 2021.</p> <p>Decision document - Cancellation of EL 8967</p>	<p>Contraventions of section 5 of the Mining Act - 'Mining or prospecting without authorisation'.</p> <p>Grounds for cancellation include 'Fit and Proper Person Considerations' under section 380A of the Mining Act that include:</p> <ol style="list-style-type: none"> 1. section 380A(2)(f) 'Not of good repute'; 2. section 380A(3) 'Compliance or criminal conduct issues'; and 3. Contravention of section 190 of the Work Health and Safety Act 2011 (WHS Act) within the meaning of section 380A(3) of the Mining Act. 	13 May 2021

Enforceable undertakings accepted

Enforceable undertakings are written, legally binding agreements proposed by a company or person which are accepted by the Secretary, following an alleged contravention of the Act. The Secretary (or delegate) may accept an enforceable undertaking as an alternative to prosecution. Enforceable undertakings that are accepted will be published.

An enforceable undertaking is a commitment by a company or person to implement initiatives designed to deliver tangible benefits for the industry and broader community. The initiatives are intended to resolve both the behaviour of concern that has led to the alleged contravention and rectify the consequences of the conduct.

Following an investigation of two counts of illegal mining near Penrith and Goulburn, on 17 June 2021, the Regulator accepted two enforceable undertakings under the *Mining Act 1992*.

1. Hi-Quality Waste Management Pty Ltd (Total value - \$87,625)

It was alleged that Hi-Quality Waste Management Pty Ltd mined clay/shale and structural clay from the Windellama Clay Mine without authorisation, thereby committing an offence under section 5 of the *Mining Act 1992*.

The undertaking will deliver several benefits to the community and assist in the proper management of the title. It also includes the payment of authorisation rent and levies and the recovery of the Regulator's costs. For further details see [Enforceable Undertaking](#).

2. Hi-Quality Quarry (NSW) Pty Ltd (Total value - \$72,691)

It was alleged that from the 17 October 2012, Hi-Quality Quarry (NSW) Pty Ltd mined clay/shale and structural clay from the Kemps Creek Central Shale Mine without authorisation, thereby committing an offence under section 5 of the *Mining Act 1992*.

The undertaking will deliver several benefits to the community and assist in the proper management of the title. It also includes the payment of authorisation rent and levies and the recovery of the Regulator's costs. For further details see [Enforceable Undertaking](#).

Significant events

We are committed to sharing rehabilitation and environmental information about significant mining-related events and activities to increase industry awareness.

In May 2021, Standards Australia adopted ISO 20305:2020 – Mine closure and reclamation – Vocabulary, which was published in 2020. The document establishes a vocabulary for mine closure and reclamation management.

NSW Mine Rehabilitation Forum

8 September 2021 | Online

AGENDA NOW AVAILABLE

[Click here for more details and registration](#)



