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- 47 Diavik Traditional Knowledge Panel, Canada
- 48 Beenup Consultative Group, Australia
- 49 Kelian Mine Closure Steering Committee, Indonesia
- 50 Raglan Mine Closure Plan Subcommittee, Canada
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- 55 Upper Nitra regional planning, Slovakia
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- 56 Cesar and La Guajira regional planning, Colombia
- 60 Mount Isa Futures Advisory Committee, Australia
- 60 Libiąż gender-responsive transition planning, Poland
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- 62 Clermont Preferred Futures Steering Committee, Australia
- 63 Bowen Basin Smart Transformation Project, Australia
- 63 Gove Peninsula Futures Reference Group, Australia
- 66 Sudbury Regreening Program, Canada
- 67 Upper Hunter Mining Dialogue, Australia
- 67 Tin Coast Partnership, UK
- 68 Reclaiming Appalachia Coalition, USA
- 72 Inti Raymi Foundation, Bolivia
- 72 Palabora Foundation, South Africa

- 73 McArthur River Mine Community Benefits Trust, Australia
- 73 Mount Rosser Remediation Project, Jamaica
- 76 The Land Trust, UK
- 77 Trust for Public Land, USA
- 77 RAG-Stiftung, Germany
- 80 SunMine, Canada
- 81 eMalahleni water reclamation plant, South Africa
- 81 Daybreak, USA
- 82 National Bioeconomy Campus, Ireland
- 82 Sanford Underground Research Facility, USA
- 83 Agua para Cajamarca program, Peru
- 84 Regeneration Enterprises, Canada
- 87 Oranjemund Town Transform Agency, Namibia
- 88 LMBV, Germany
- 88 Korea Mine Rehabilitation and Mineral Resources Corporation (KOMIR), Korea
- 89 Impact Catalyst, South Africa
- 89 Bokamoso Ba Rona Agri-Industrial Program, South Africa
- 92 Uranium City monitoring, Canada
- 93 Woodcutters Liaison Committee, Australia
- 93 Traditional Knowledge Monitoring at Diavik, Canada

Navigating the handbook

The diagram below provides a route map to help readers navigate the different approaches and tools in the handbook, through a series of key questions.





Foreword

A foreword by Sir Tim Smit KBE, Co-founder of the award-winning Eden Project near St Austell in Cornwall, on the extraordinary potential for socio-economic transition, post mine closure.

Just imagine...

Give me an old mine and combine it with a social and an environmental challenge and you have the recipe for excitement, entrepreneurism and opportunities for good practice.

Imagine the tens - if not hundreds - of millions of years embodied here which can be capitalised again through radical approaches to energy generation, repurposing or travel destination creation, which have the potential to enable local people to reimagine their local space.

Since the year 2000, Eden has returned £2.3 bn into the Cornish economy, both through the attraction of visitors, but also through stimulating the development of new businesses. If what you do enables your neighbours to create a living through your ethical approaches, you are a proper member of the community.

If only mining companies could relax and embrace change and the potential for construction and regeneration.

This is the very essence of what is meant by Legacy, and I salute all who revisit their notions of mining and instead now see them as opportunities of many types.







Mining projects often generate significant socio-economic transitions for host communities. When new mines are being developed, these transitions are often experienced as expansive, opportunity-generating occurrences. Closure, and associated periods such as major downsizing or temporary care and maintenance, by comparison, can often be characterised by a reduction of economic opportunities and socio-economic disruption for communities.

A company's relationship with host communities, local businesses and local government, while influenced by the good times delivered in peak production, is likely to be judged by the success of the socio-economic transition achieved in those societies after the mine has closed.

It is in the interests of communities and companies alike for this transition to be a success, whether to foster a new era of economic diversification in a community or to offer a positive conclusion to a relationship that can serve as an example of good practice mining for future endeavours.

Notwithstanding the shared imperatives for achieving a successful socio-economic transition, it needs to be acknowledged that the track record for achieving this objective is poor. This is not aided by the relatively small number of mines which formally close, with many instead entering extended periods of care and maintenance, being held in perpetuity, or being on-sold to companies with limited resources to implement effective closure.

While there is a great diversity of context-specific elements that help determine the nature of such transitions, communities that have been able to more successfully and sustainably transition to a post-mining economy have generally had the benefit of or been able to harness:

- a clear vision of what they collectively want for their community in the future
- geography (i.e. place-specific aspects, such as natural landscapes or transport infrastructure, that are important in enabling post-mining transformations)
- the time and information to prepare for the upcoming socio-economic transition
- support from external parties (whether in the form of financing, planning support or investment)
- community resilience (encompassing social, cultural, economic and environmental resilience)
- innovation (i.e. entrepreneurial and creative action in response to the challenges).

These success factors clearly demonstrate that a shared challenge like this, which impacts across disciplines, business units and stakeholders, needs a shared solution across business units, disciplines and, importantly, stakeholders. Multistakeholder models involving the mining company, regulators and local government, host communities and/or Indigenous groups, civil society organisations and researchers are essential for the success of the mining transition.

Mine closure and delivering a positive transition is inherently complex. In addition to the optimisation of social, financial and environmental considerations there is a myriad of factors that cannot always be controlled or managed in the transition journey (such as context, geography, policy and government regulation). Rather than tackling each challenge separately, using multistakeholder, multidisciplinary models and a shared approach to risk can turn the barriers to creating positive legacies in mining regions into real opportunities.

A common thread running through these multistakeholder approaches is that the company rarely plays the lead role and there is a shift away from the traditional company-centric approach. Contrary to the general inclination of (and to some extent, expectation placed on) mining companies to lead initiatives,

multistakeholder approaches will need companies to become comfortable in relinquishing control and adopting new roles as conveners, co-participants, financiers, advocates and capacity builders. Companies will also need to actively plan for their own exits by progressively transferring the ownership of processes (i.e. responsibility and accountability for the processes) to other stakeholders such as communities, Indigenous Peoples, non-government organisations (NGOs), local and national government, new enterprises and other businesses. Importantly, a multistakeholder approach to socio-economic transition requires a mindset shift within mining companies from a transactional to a partnership-based model.

Mine closure and the associated socio-economic transition needs to be recognised as a dynamic, progressive and uncertain process, where a long-term vision of potential post-closure scenarios is needed. While it may be difficult to predict the economic diversification opportunities that will exist 30 or 40 years into the future, mining companies and other stakeholders need to start resilience-building initiatives as early as possible during the operational phase of mines. Evidence shows that the best preparation for the eventual closure of a mine starts before a mine is developed and continues throughout the life of the mine. A number of the multistakeholder approaches



described in this handbook can be initiated early in the mining cycle, while others tend to develop later in the life of a mine. Irrespective of when they are initiated, they all share a common theme; that the longer the timeframe to prepare for the socio-economic transition prior to it occurring, the greater the likelihood of a resilient and sustainable community existing after the transition.

Multistakeholder approaches can take a wide variety of forms, depending on the timing, focus and context. Although every situation is unique, there are some general principles, common lessons and techniques that are relevant to other situations. This handbook both illustrates the place-specific diversity through the numerous case studies and also draws out general themes and lessons through the typology of approaches and tools.

1.1 Purpose

This handbook has been developed to address a gap identified in the availability of information on how to develop and use multistakeholder approaches for socio-economic transitions.

It is part of ICMM's ongoing work around community resilience and mine closure and is relevant to Indigenous Peoples' participation in mining. Mine closure was one of the first priority areas that ICMM developed guidance on, producing publications on financial assurance for mine closure in 2005 and 2006. In 2008, the Planning for Integrated Mine Closure: Toolkit was launched, which was then updated as the Integrated Mine Closure: Good Practice Guide (2nd edition) in 2019.1 ICMM has also developed additional resources to support the industry in implementing responsible closure practices, including Financial Concepts For Mine Closure (2019),2 and the Closure Maturity Framework (2020)3 which is designed to assess, drive and track assets' progress toward sustainable closure.

The handbook also complements ICMM's existing portfolio of work in community resilience and various resources on social performance and community engagement. The handbook should also be considered alongside ICMM's Position Statement on Indigenous Peoples and Mining and Good Practice Guide as well as the various supplementary resources on human rights due diligence.

The handbook is therefore intended to:

- be used by mining companies and external stakeholders to co-design or contribute to socioeconomic transition processes that foster community resilience and enable site-to-regional scale planning
- lay the groundwork for local economic participation, sustainable land use, and environmental resilience in and around mining communities, such that they will be resilient during the up and down cycles of mining and beyond closure
- provide mining companies with a suite of tools and options to support multistakeholder processes for socio-economic transition, which they could choose to apply across the varied contexts within which they operate.

While the handbook has been developed primarily with a mining company audience in mind, it also contains suggestions and approaches which may be of interest to governments, NGOs and civil society groups.

^{1.} ICMM. 2019. Integrated Mine Closure: Good Practice Guide, 2nd ed. https://www.icmm.com/integrated-mine-closure

^{2.} ICMM .2019. Financial Concepts for Mine Closure https://www.icmm.com/en-gb/guidance/environmental-stewardship/2019/financial-concepts-for-mine-closure

^{3.} ICMM. 2020. Closure Maturity Framework https://www.icmm.com/en-gb/guidance/environmental-stewardship/2020/closure-maturity-framework

1.2 Layout of the handbook

The handbook provides an introduction to socioeconomic transitions and multistakeholder approaches, followed by descriptions of nine different types of multistakeholder approaches, with a range of illustrative case studies, along with short profiles of 11 tools that can be applied to one or more of these approaches.

- Section 2 explores the key aspects of socio-economic transitions in relation to mining, including what elements can shape their success and lessons which have been learned to date.
- Section 3 provides a general overview of multistakeholder approaches in socio-economic transitions, including why and how mining companies can have a role, and factors which can enable multistakeholder approaches to develop and run successfully.
- O4 Section 4 describes nine different multistakeholder approaches.

 The profile of each multistakeholder approach includes the following sections:
 - Level of company involvement
 - Outline of the approach
 - How they work in practice
 - Tools that may be useful
 - Where they fit in the mining lifecycle
 - What roles can mining companies play
 - Prerequisites for success
 - Potential limitations
 - What to avoid
 - Good practice
 - Key questions to ask

The multistakeholder approaches are illustrated with 40 case studies from 16 different countries.

Section 5 introduces 11 tools that may be useful in applications of multistakeholder approaches to socio-economic transition. This section provides short profiles of these tools and points to other resources that can be accessed to learn more about the use of these tools.

Other useful references related to this handbook are included in the Annexe.

Socio-economic transitions



Socio-economic transitions can be defined as shifts or whole-scale transformations within mining-affected communities and economies, triggered by a major change in mining activity in the area.

These changes can entail increased activity (such as during mine development or a major expansion), reduced activity (e.g. during mine closure, a major downsizing, or when a mine is put in care and maintenance) or operational changes (e.g. a shift towards automation or the introduction of a fly-in, fly-out (FIFO) system of working). While the handbook focuses primarily on the transitions associated with reductions in mining activity, many of the multistakeholder approaches described are equally applicable to other situations of transition.



2.1 What are the main components of socio-economic transitions?

Socio-economic transitions will entail a whole range of different aspects, as communities move from a mining to a post-mining context. Some of the main tangible and intangible elements of socio-economic transitions are illustrated in Figure 1 and Table 1, respectively.

Figure 1 shows how different mine features can be transformed during transition to enable them to contribute to post-closure outcomes. Some of these transition elements lend themselves to particular types of multistakeholder approach outlined further in this handbook.

Figure 1. Tangible aspects of socio-economic transitions

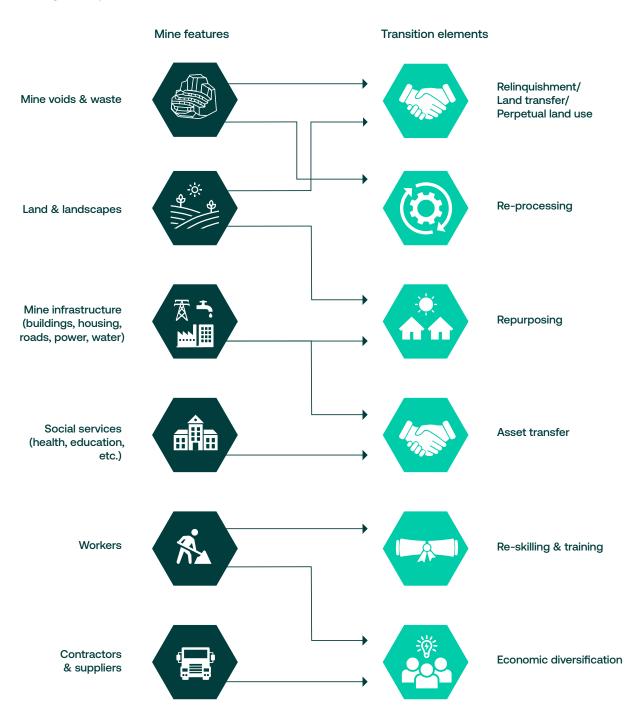


Table 1 presents potential scenarios for some intangible aspects of socio-economic transitions. In some ways, intangible aspects can be more challenging to address, and many are beyond the control and outside the

expertise of mining companies. Community-level multistakeholder approaches, if undertaken in a sensitive manner and with communities taking the lead, can help avoid the worst-case scenarios.

Table 1. Some community-level intangible elements of socio-economic transitions

Intangible element	Best case scenario	Worst case scenario
Social cohesion	Social cohesion is maintained or even strengthened as community members pull together during the challenge of transition.	Social cohesion breaks down as community demographics change and transition polarises the community, exacerbating inequalities and creating rifts between different interest groups.
Cultural identity and sense of place	A new post-mining identity creates a sense of pride.	Cultural identity is lost at both an individual ('miner') and community ('mining town') level.
Hope for the future	Most residents see the possibility of a bright future where the community can thrive and grow.	A sense of despondency sets in, the future looks bleak to most residents and mental health problems escalate.
Societal values	Societal values are retained, as evidenced by stable levels of antisocial behaviour.	Economic decline post-closure leads to an erosion of values, evidenced by a rise in vandalism, crime, and domestic violence.
Trust in the transition process	Trust is built or maintained through transparent and collaborative approaches.	Distrust and conflict lead to disengagement by key groups.

The importance of intangibles

The intangible aspects of socio-economic transition can often be overlooked as the focus tends to favour more concrete issues that are readily observed, measured and addressed. Nonetheless, these less visible variables, such as a sense of purpose and pride of place, can have a significant impact on how communities cope with transitions. Professor Roberta Ryan, an Australian social planning expert, puts it this way: "Community spirit is a significant asset for communities dealing with change, if somewhat less tangible than physical infrastructure, skills and local business expertise." Community perception surveys are one tool that can offer some insights into these kinds of nuanced and subjective issues.

2.2 What shapes the nature and success of socio-economic transitions?

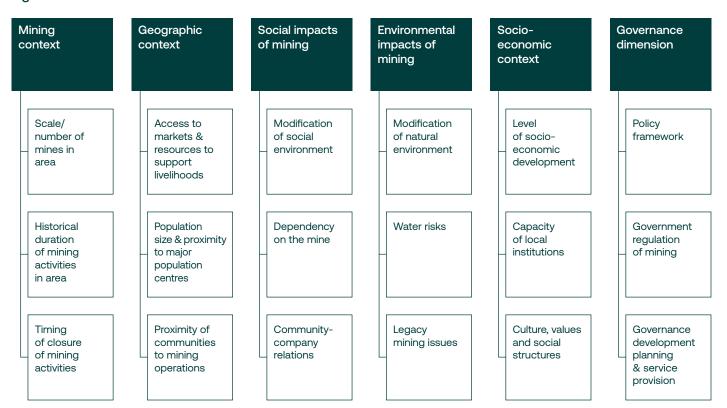
Context is critical. Planning for and managing socioeconomic transitions is complex and challenging, and so context is key. The context within which a transition takes place will have a major role to play in shaping how the transition will play out and how successful it will be. The same contextual issues will also set the scene for how companies, communities, governments and other stakeholders will interact with each other, which in turn will impact any multistakeholder approaches being used for socio-economic transition.

There is a vast difference in the risk of adverse post-closure outcomes between, for example, a FIFO mine with distant local communities and a region with multiple other mines closing at the same time. Additionally, within these transition contexts, the experiences of different community-level groups may vary enormously with some groups being more adversely impacted than others.

^{4.} University of Newcastle. 2023. New research reveals encouraging step for Hunter renewal. https://www.newcastle.edu.au/newsroom/featured/new-research-reveals-encouraging-step-for-hunter-renewal

Every situation is unique and the processes which can support transition efforts will look different in each case, but a participatory, inclusive and equitable process will enhance community resilience and contribute to a just socio-economic transition. Figure 2 presents some examples of contextual issues common to most mining areas. Companies need to develop a good understanding of the kinds of issues that apply in their mining contexts, to be able to effectively plan for socio-economic transitions.

Figure 2. Some contextual determinants of socio-economic transition outcomes

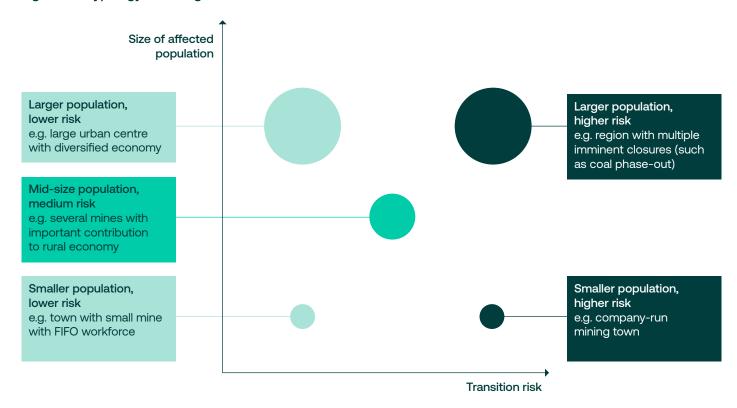


Adapted from: Everingham, J. et al. 2020. Mining regions in transition - a global scan. Centre for Social Responsibility in Mining.

Figure 3 illustrates how different mine site contexts will have different levels of risk of negative transition outcomes. In general, large mining regions facing multiple closures, as well as small company-run mining towns with a resident workforce, will risk steeper and deeper economic downturns post-closure, with slower and less complete recoveries compared to other areas. As shown in Figure 3, the different contexts will also

have different levels of need for multistakeholder approaches. In general, multistakeholder approaches will be most critical in mining areas with large population concentrations and/or high risks of negative transition outcomes, given the higher numbers of stakeholder groups present and the higher consequences if post-closure recovery fails.

Figure 3. A typology of mining contexts in relation to socio-economic transitions



What does a successful socio-economic transition look like?

A successful transition can be defined as one that achieves positive outcomes for the local economy and local communities, leaving them resilient to the potential social and economic shocks associated with a reduction in mining activity. Ideal outcomes could be evidenced by, for example, a thriving and diversified economic base that provides good employment opportunities, mining land and assets being used for activities that support the communities' economic, social or cultural wellbeing, and a sustainable population with the appropriate skills and resources to benefit from the transformed economy.

However, this kind of scenario is rarely the reality and in practice the definition of a successful transition will depend on the characteristics of each situation and the perspective of each stakeholder group.

From a company's point of view, at a minimum, a transition should enable it to fulfil its legal obligations and other requirements, and to meet all its closure and post-closure objectives. A company will also want to see a transition process and outcome that leaves a positive legacy, reflecting well on its reputation and its prospects of achieving approval for any future operations in the same area or further afield.

Those involved in the company's closure planning will want to feel a sense of pride in the results of their work and their collaboration with other stakeholders.

Community expectations of transitions will vary enormously and change over time and place. For some, a transition will only be considered successful if it has left the community in a better condition than it was prior to the presence of the mine. For others, a successful transition is one that has effectively addressed any negative impacts of mining and leaves no legacy issues. Others may feel that a transition is successful if the community is able to replace the loss of mining-related economic benefits with new industries. In some cases, Indigenous Peoples may consider successful transition an impossibility due to the permanent loss of spiritual or cultural connections with miningimpacted land or the loss of sacred sites that cannot be reconstructed.

Given the diversity of definitions of success, it is beneficial to collaboratively define and design a post-mining vision which is supported by all parties in advance of closure.

(See <u>Tool 11</u> in Section 5 for examples of transition outcome indicators.)

2.3 Timing of transitions

Transformation of a mining-based economy to a post-mining diversified economy often takes several decades. This long timescale is one of the most challenging aspects of transition planning.

Figure 4 outlines aspects of different scenarios relating to these timescales.

An ideal narrative is that mining creates opportunities during operations which leave communities better off after mining has finished than they were before the mining project started. However, the reality of mine closure is that they don't always close according to plans or stakeholder expectations. Rather than focusing on a single endpoint of relinquishment, companies need to recognise closure as a dynamic, progressive and uncertain process and take a long-term vision of post-closure scenarios.

The reality for communities is also complex. Prior history will shape how they respond to a new mining project.

Opportunities from mining operations are often lower

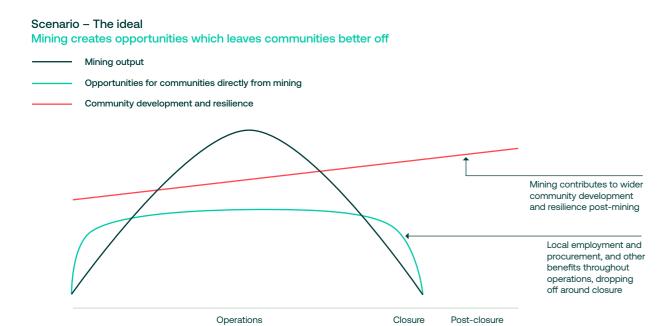
than (often unrealistic) expectations. Other external factors will make it hard to attribute what changes are a result of mining. Mining communities will often experience a decline when mining finishes, which may be difficult to recover from.

While it may be difficult to predict the economic diversification opportunities that will exist 30 or 40 years into the future, mining companies and other stakeholders need to start resilience-building initiatives as early as possible during the operational phase of mines. This means, for example, building a post-closure perspective into social investment activities from the start and even considering potential post-closure repurposing of mine land/assets during the design of the mine.

Multistakeholder approaches can help build tailored responses early to build resilience to these uncertainties.

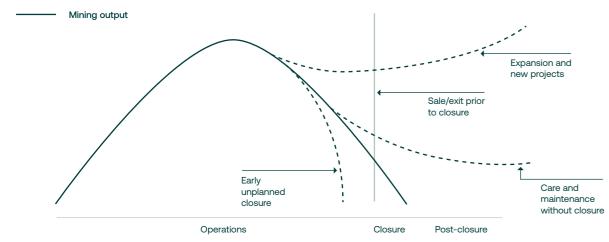
and an uncertain future

Figure 4. Transition scenarios: the ideal, realities for closure and for communities, and the role of multistakeholder approaches in building resilience



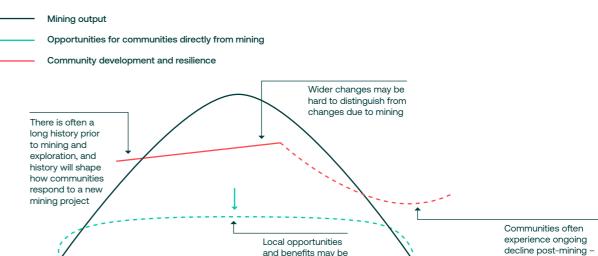
Scenario – Mine closure realities

Mines do not always close according to plans and expectations



Scenario - Community realities

Post-closure transitions for communities are uncertain



less than expected

Closure

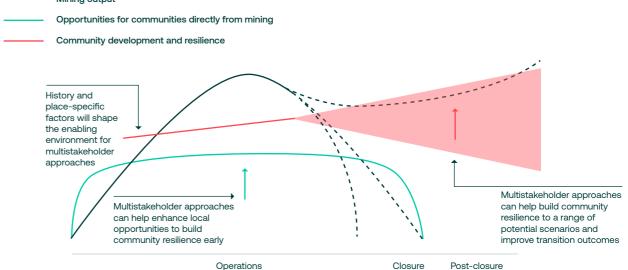
Post-closure

Operations

Scenario – Multistakeholder opportunities

Collaborative approaches can build resilience

Mining output



2.4 Lessons learned on socio-economic transitions

The following lessons on socio-economic transitions have emerged from experience:

Socio-economic transitions are 'wicked problems'. Mine closure and socio-economic transitions have been characterised as 'wicked problems', i.e. issues that:

- are driven by many different factors that are themselves challenging and changing
- are socially complex, and culturally and politically charged
- involve different stakeholders with conflicting priorities and no clear consensus on what should be done
- are not amenable to obvious or 'best' solutions, and often only 'least-worst' options.

Even with careful planning to minimise and mitigate transition impacts, it is often challenging to develop measures that will replace the local economic benefits from mining that are lost after closure. This is particularly the case in some rural areas where the employment and income potential of other sectors, such as agriculture and tourism, can be below what mining would have offered.

Some aspects of transitions are predictable.

While each transition will be unique and have its own set of issues, some of the major socio-economic changes from mine closure can be predicted.

These include common closure consequences such as unemployment, population decline, real estate devaluation, social tensions, and loss of market for

local suppliers.



Closure-related transitions are part of a continuous process of change within communities. These transitions are rarely interruptions in an otherwise static setting. Mining-affected communities will undergo socio-economic transitions throughout the life of a mine, and while transitions will be most significant at construction and closure, other phases of the operation will also bring marked transitions, such as if changing from a residential-based mine to a FIFO workforce, a major expansion project during the mine life, or a reduction in mining activities due to changes in commodity prices. More broadly, mining-related transitions often occur against a backdrop of wider changes at a regional or national level. These can include, for example, gradual shifts in cultural and societal norms, trends in economic growth or recession, and the development of other mines in the same area.

Local stakeholders will be concerned about the socio-economic impacts of transitions before they are announced. Even before a major reduction in mining activity is publicly announced, disruption to local communities will most likely already have started. Suspicions may be raised by what the company is doing (e.g. increased redundancies) or what it is not doing (e.g. a lack of investment in the mine). Uncertainty and doubt can be damaging, especially in areas with strong economic links to mining. Government authorities and others will be concerned about the sustainability of company-provided social services and the cessation of royalty payments and taxes that have supported investment in the areas. Families that depended on the mine for their livelihoods will be worried about whether they can stay in the area or if they will need to move to find employment elsewhere. Those whose businesses rely on the mine will face similar dilemmas. Homeowners may be worried about a sharp fall in the value of their houses as residents increasingly sell up and move or as confidence in the housing market starts to ebb. The airing and resolution of grievances will gain urgency as people anticipate their access to grievance management systems and redress will soon cease. Once closure is announced and gets underway, the ramifications for local communities will increase dramatically.



There are often unspoken assumptions and unrealistic expectations about closure timeframes and responsibilities. Communities may prefer not to raise discussions about closure if they see the continued presence of mining as beneficial or if they fear that mining impacts will be left unresolved after the company leaves. Communities that have lived with mining for many years, or that have seen previous closure plans cancelled, may find it hard to believe that closure will take place as announced. Mining companies may be uncomfortable discussing with local and national governments where each of their separate responsibilities lie for post-closure scenarios. This can be particularly difficult when parallel discussions are underway to seek regulatory approval for a mine closure plan. In an effort to win community support, companies may overpromise positive outcomes for communities or introduce ambitious social investment projects that will be unsustainable post-closure. For their part, governments may be hesitant to commit to maintaining company-provided services or facilities post-closure, if these assets are very costly, high risk or out of line with what is available in neighbouring areas.

Mine closure is rarely a smooth, linear process.

While closure is, in theory, a gradual winding down of mining activity as resources become depleted, in practice this is by no means the norm. In many cases, closure is unpredictable and unplanned. For example, around two-thirds of 800 mine closures in Australia during a 25-year period (1981-2009), were abrupt and premature closures due to problems such as weak financial viability, technical constraints, political or social instability, or environmental impacts. 5 Such unplanned closures leave little or no opportunity for managed transitions. Even planned closures may be preceded by periods where mines are put in and out of care and maintenance, sometimes at short notice and for extended periods, resulting in major disruption for local communities and workers. Prior experiences of sudden reductions in mining may inadvertently help build local resilience to the shocks of closure when it does occur.

Community-level transition impacts are not

homogenous. Negative impacts of transitions are often compounded for groups such as women, children, people with disabilities, and youth. The effects of social conflict, outmigration, loss of social infrastructure and disruptions to livelihoods often pose greater risks for these groups, and socio-economic transitions can exacerbate existing inequalities. Tailored inclusive and equitable solutions are needed to adequately address these heightened vulnerabilities.

Transitions do not change communities in ways which are easily comparable with a pre-mining 'baseline'. In many cases, mining communities will be permanently transformed by their links to mining. This is particularly the case for company-established mining towns, which may become ghost towns following closure, but even pre-existing towns and villages will retain some imprint of mining in their social, environmental and economic fabric. This may be seen, for example, in the make-up of local economies, as many local businesses may have developed to cater to the needs of the mine, or in the dynamics of social relations, as ex-mine workers and their families tend to maintain strong and long-lasting ties.

Mining and other causes of transitions are often conflated. It is often difficult for stakeholders, such as local communities, to distinguish between mineclosure-related and other non-mining causes of the changes they see happening, particularly as closure can accelerate or heighten the dynamics already present in local socio-economic systems. For example, outmigration from a remote mining area may have been happening prior to mine closure, but closure may exacerbate the occurrence.

The track record on socio-economic transitions is very mixed. Alongside the many innovative examples of successful post-closure transformation, there are countless cases of unmanaged or poorly managed transitions. In the worst cases, mining-affected communities have effectively been set up for post-closure failure and left with intergenerational challenges as the impacts of closure have gone unaddressed.

^{5.} Laurence, D.C. 2006. 'Why Do Mines Close?'. In A.B. Fourie and M. Tibbett (eds). Mine Closure 2006: Proceedings of the First International Seminar on Mine Closure, pp. 83–94. Perth: Australian Centre for Geomechanics.

^{6.} See, for example, Whitbread Abrutat, P. and Lowe, R. 2024. 102 Things to Do with a Hole in the Ground. Cornwall: Eden Project.

Lessons learned from socio-economic transitions outside the mining industry			
Issue	Lesson learned	Case studies	
Iterative stakeholder engagement	When engaging stakeholders at the decommissioning phase of a project, it is important to acknowledge that stakeholders' interests and priorities may shift over time. Stakeholder engagement during the end phase of a project should therefore be iterative and adaptive to changing circumstances and changing stakeholder needs and preferences between the closure planning and closure implementation stages.	Dounreay nuclear site closure, UK Decommissioning of nuclear sites under the International Atomic Energy Agency	
Early and transparent communication with stakeholders	Governments and operating companies should communicate closure plans to stakeholders as soon as these are confirmed. Early disclosure of all relevant aspects, including anticipated opportunities and challenges, enables stakeholders to effectively plan for post-closure scenarios, ensuring they are equipped with the necessary knowledge to make informed decisions. Communication content and formats should be adapted for non-expert stakeholders.	Automotive sector closure, Australia Komati power plant closure, South Africa	
Inclusion of stakeholders in decommissioning activities	Including local stakeholders and businesses in decommissioning activities can mitigate socio-economic impacts of closure for community members and local businesses. Engaging stakeholders in decommissioning work can provide an alternative source of economic activity for those who will lose their jobs or their income sources as a result of the closure.	— Vandellòs nuclear power plant closure, Spain	
Understanding inequalities in transition impacts	Special effort is needed to understand how the impacts of closure may be worse for some local stakeholder groups. For instance, women, ethnic minorities and those living with disabilities often suffer most from post-closure job losses and wage inequalities. Transition planning needs to take these potential inequalities into account.	Automotive sector closure, Australia Kodak plant closure, Rochester, USA	
Repurposing and reskilling as part of decommissioning	When possible, repurposing should be a preferred option in order to generate new economic activities for local stakeholders. To maximise opportunities related to repurposing and economic diversification, companies should consider reskilling workers and community members in view of emerging activities as part of a decommissioning project. This can help prevent adverse closure outcomes such as large-scale outmigration and regional economic decline.	Kodak plant closure, Rochester, USA Komati power plant closure, South Africa	
Capacity building for post-mining land use (PMLU)	Where land or assets are transferred for use by communities or local governments, it may be necessary to strengthen the capacity of these stakeholders to undertake land-use planning and management. Capacity building may be needed on administrative and legal matters.	Land return by a forestry company (GRL Tanzania), Tanzania	
Strong government capacity to coordinate stakeholder engagement	Stakeholder engagement is more effective when national and sub-national governments provide the necessary regulatory framework and support to facilitate operating companies and local stakeholders' co-creation and implementation of the decommissioning projects. Companies can cooperate with governments to improve their engagement capacity with local stakeholders.	Komati power plant closure, South Africa Automotive sector closure, Australia General Motors plant closure, Janesville, USA	

(See $\underline{\text{Annexe}}$ for references related to insights from non-mining transitions.)

Multistakeholder approaches



3.1 Emerging approaches to socio-economic transitions

Socio-economic transition is not the responsibility of any single party and mining companies alone cannot and should not plan, implement or lead these transition efforts in isolation. Multistakeholder approaches are needed to build a shared vision for a post-mining society and to generate and diversify ownership in both the process and the outcomes. Successful socio-economic transitions require mining companies to shift from conventional company-centric closure-planning processes to a partnership approach, as illustrated in Table 2.

While collaborative approaches to socio-economic transitions have often been restricted to consultative closure committees and participative monitoring committees, there are an increasing number of other types of approaches being applied to these situations. Mining companies participation in multistakeholder approaches will increasingly become the expectation and norm, as a means to prepare for and deliver successful socio-economic transitions in host communities. Mining companies are only temporary land users and ownership of the future of host communities is best led by those with a long-term stake in that future.

Table 2. Comparison of conventional and emerging approaches to socio-economic transitions

Conventional approach			Emerging approach
Focus	Biophysical aspects of mine closure	-	Diverse aspects of socio-economic transition
Social goal	'Communities better off'	→	Community resilience to transition shocks
Mine closure assumption	Single defined mine closure date	→	Multiple potential scenarios for planned and unplanned closure, expansion, downturn, etc.
Relationship approach	Transactional arrangements	→	Partnership approach
Control of process	Mining company led	→	Partnerships within local stakeholder network
Level of participation	Company managed processes of consultation	→	Stakeholders empowered to take responsibility in decision-making
Timing of participation	Early consultation on mining company closure plan	→	Ongoing support to building resilience
Typical methods	Tools suitable for managing simple systems	→	Tools useful for working in complex systems and wicked problems, including collaboration and innovation
Key drivers	Legal compliance and financial liabilities	→	Social contract and shared risk and opportunity
Funding	Funded through company closure provisions	→	Leverage of multiple company and government assets and funding

3.2 Understand the benefits of multistakeholder approaches

Multistakeholder approaches offer important benefits for the management of socio-economic transition. For example, these approaches can:⁷

- Provide more transparency about the upcoming changes in mining activity and the likely implications for local stakeholders.
- Foster a shared sense of ownership and responsibility among the participating stakeholders about the need to collectively manage the impacts of socio-economic transitions.
- Help build a common vision about a post-mining future for the local area or wider region.
- Improve the quality of decision-making by incorporating the diverse knowledge and perspectives of key stakeholder and rightsholder groups, including Indigenous Peoples' knowledge and worldviews.
- Help provide a voice for stakeholders who will live with post-mining legacies.

- Enhance alignment of transition outcomes with community aspirations for sustainable development.
- Enable open discussion of sensitive and potentially conflictual issues in a constructive and facilitated setting.

Do multistakeholder approaches lead to successful socio-economic transitions?

Multistakeholder approaches to planning, implementing and monitoring transition-related initiatives can certainly help strengthen the resilience of communities and regions to the shocks from their transition to post-mining futures. But they are hugely challenging. Numerous case studies, summarised in Section 4, have involved setbacks and shortcomings that have affected their long-term impacts. Nonetheless, there is sufficient evidence to show that multistakeholder approaches are a valuable means of addressing difficult transition-related issues and avoiding the worst outcomes.



^{7.} Adapted from: Everingham, J-A. et al. 2020. Participatory processes, mine closure and social transitions. Centre for Social Responsibility in Mining. Brisbane: University of Queensland.

Challenges that have limited the use and effectiveness of multistakeholder approaches for mine closure

Multistakeholder approaches to socio-economic transitions can present significant challenges and as a result have often failed to materialise or failed to deliver on their promises. Below are some of the more common obstacles experienced when seeking to develop and implement a multistakeholder approach.

Timing

Multistakeholder approaches need time to develop, to build trust amongst participants and to achieve agreement on the task to be addressed.

Multistakeholder approaches need to be developed at a pace that allows local stakeholders to participate meaningfully, which may be out of sync with the shorter timeframes the company is working on (e.g. budgetary or regulatory timelines for closure planning). Often, multistakeholder approaches are established late in the day, when mine closure is imminent, or may have already occurred, increasing the pressure on all participants and reducing the opportunity to work together collaboratively.

Information and disclosure

There is generally asymmetry of information around mine closure, with the company often the only party with a comprehensive sense of when closure is likely to occur and what it will entail. In the absence of sharing this understanding more broadly, it can be hard to convince other stakeholders to participate in, and remain motivated to plan for, a socio-economic transition. In addition, adequate information may not be readily available about the wider region and landscape that would enable stakeholders to make more informed decisions about future possibilities.

Positive news bias

Often, mines will be considering both an expansion opportunity and a closure scenario at the same time. Human nature can be such that stakeholders, be they communities, companies, governments or civil society organisations, focus on the upside (i.e. the potential) and assume the downside will be unlikely to occur. In this context, it can be very difficult to motivate people to engage in scenarios in which mining may finish.

Trust and conflict

Sometimes unresolved historical or new issues between stakeholder groups may be so serious that the relationships between them lack the trust to enter into multistakeholder processes, even where there are strong drivers for collaboration. In these cases, it may be necessary to enter into dispute resolution or trust-building processes prior to attempting to develop multistakeholder platforms.

Control

Intrinsic to the notion of a multistakeholder approach is the acceptance of a reduced level of control. Joining in and supporting multistakeholder approaches, where a mining company does not have ultimate control and may have only limited influence over decisions, can be new and potentially uncomfortable territory for a mining company. Similarly, some stakeholders may expect a mining company to take responsibility and play a leading role. This can limit the scope of topics on which a mining company is willing or able to engage.

Resourcing levels

As mineralisation dwindles towards the end of a mine's life, so too do the financial and human resources available to a mining company. Advocating for an increase in resources can be challenging in this context, and yet this can be a critical time for well-resourced and effective engagement via multistakeholder forums. Governments may not have resources they can (or are willing to) commit to areas facing transition over a long period of time and with uncertain outcomes – particularly if resource requirements are potentially significant.

Turnover

As employees, government workers, council representatives, community leaders and civil society representatives prepare for their own futures, high levels of turnover are common. While institutional relationships are the basis of multistakeholder approaches, they are generally made successful through the personal relationships and leadership shown by individuals. In the absence of measures to ensure succession and transfer roles and ownership, multistakeholder approaches remain highly vulnerable to turnover.

3.3 Understand mining companies' roles and capacities

Mining companies have key roles to play in the majority of multistakeholder approaches, though these are often different from the typical roles that companies have taken on when interacting with stakeholder groups such as local communities or local government.

The more conventional 'transactional' approach to collaboration entails companies supporting a service or input from other stakeholders in the expectation of a benefit in return. This kind of arrangement is appropriate in many situations, particularly where there is a straightforward 'deliverable' or 'output'. However, in the

case of socio-economic transitions, where achievement of anticipated outcomes is much more challenging and unpredictable, a collaborative, partnership approach is essential (see Table 3). These partnerships are generally at least three-way collaborations, typically involving mining companies, local communities and local government, though many other stakeholder groups are often involved. A common thread running through these multistakeholder approaches is that companies are rarely playing the lead role. Instead, companies are typically one of the multiple stakeholder groups represented in a collaborative body or process, without a dominant position or overarching responsibility, as shown in Figure 5.

Figure 5. Mining companies as collaborating partners within a network of stakeholders

1. Unsustainable state: Mining operating in its own interests, seeing itself (and being seen by others) at the centre of the universe



2. Desired state: Mining operating as a development partner within a network of stakeholders



This means that mining companies may need to take on roles which they may not typically play, such as sharing more information than they may typically do about mine closure, using convening power to bring stakeholders together, entering dispute-resolution processes in order to overcome historical mistrust, handing over decision-making to others on key aspects such as repurposing, and helping leverage funding from other sources. At the same time, other stakeholder groups may need to adjust their expectations to no longer view mining companies as solely or ultimately responsible and accountable for the decisions and outcomes of the collaborative process.

In the different multistakeholder approaches outlined in this handbook, mining companies may play one or several of the following roles:

- Convene use existing relationships to bring together different stakeholders in the transition process, often where others may not be in a position to do so.
- Co-participate engage alongside other stakeholder groups in a process, including sharing information and collaborative decision-making.
- Process lead take primary responsibility for establishing and managing a process.
- Build capacity support training and empowerment of other stakeholders in order to enable them to engage and participate more effectively in a process.
- Finance provide financial (or staffing or in-kind) resources to support a process.
- Advocate support a process by influencing other stakeholders.

Companies can take steps to develop their own internal capacities to effectively participate in multistakeholder processes. The following are some of the main capacities required:

- Strong and sustained commitment from Board and/ or Executive leadership.
- Recognition of the company's role as an important societal actor with responsibility of the risks and impacts created beyond the site.
- Internal alignment on the need to manage socioeconomic transitions and the value of multistakeholder processes, so that all company representatives work towards these objectives.
- Provision of adequate resources to support open, participatory, and inclusive multistakeholder engagement for socio-economic transition.
- Open interaction with stakeholders, and cultivation of respectful and enduring company-community relations.
- Recognition that communities are not homogenous and acknowledgement of diverse impacts and perceptions on socio-economic transition.
- Capacity building of local authorities and institutions including on participatory processes.
- Incorporation of systems to ensure continuous improvement processes respond to the changing circumstances of socio-economic transition.
- Monitoring, measuring, and managing positive and negative impacts relating to socio-economic transition, and openly sharing and discussing these with other stakeholders.
- Transparent communication about the company, its proposals, and intentions regarding socio-economic transition, while managing the expectations of different stakeholders.

From a transactional to a partnership approach

The development of a multistakeholder approach to socio-economic transition requires a mindset shift

within mining companies from a transactional to a partnership-based model. **Table 3** provides some examples of the differences between a transactional arrangement and a partnership approach.

Table 3. Contrasting features between transactional and partnership approaches

	Transactional arrangement	Partnership approach
Scope of work	One party decides on a program of work based on their knowledge and experience	Co-generation based on joint knowledge/experience
Flow of resources	One party purchases a service from – or donates to the work of – another	Partners bring together complementary resources (including those such as social capital which may not be 'for sale')
Contractual basis	Legally binding contractual arrangements with clear activities and outputs decided at the beginning	Non-binding partnering agreement with clear agreed expected outcomes, with flexibility over how to get there (often accompanied by legal contract covering financial elements)
Commitment	Limited engagement from parties beyond the contractual arrangement	Willingness/appetite to go above and beyond 'business as usual'
Ways of working	Each party stays in its comfort zone, doing what they normally do	Partners work together to create new ways of working
Accountability	One-way	Mutual
Delivery capacity	Contracted partner expected to have full capacity to deliver	One partner may support capacity development of the other to deliver more effectively

Advantages of a transactional approach	Advantages of a partnership approach
Well-defined and manageable commitment Lower management and administration costs – requires significantly less investment in relationship-building	Stronger potential for innovative solutions More appropriate/implementable approaches within a specific context
Clear decision-making authority and unambiguous contractual relationship Predictable procedures and outcomes	More adaptable to changing realities Stronger commitment from partners – willing to go the extra distance
Clear lines of authority and accountability Comfortable/familiar	Better-informed decision making Wider potential for influence and change Stronger overall accountability
	Greater potential for mutual learning

Adapted from: ICMM and the Partnering Initiative. 2021. Partnering For Our Common Future:

Optimising mining's partnering capability to contribute to community resilience and thriving societies.

What is the business case for using multistakeholder approaches?

To some extent, it is difficult to present a strong business case for companies to use, support or participate in multistakeholder approaches. The regulatory framework for these approaches is lacking. While stakeholder engagement during mine closure is a regulatory requirement in some jurisdictions, there is no such requirement for multistakeholder collaboration. Additionally, these approaches often require companies to invest considerable amounts of time and money, with no guaranteed return.

At the same time, companies that get involved in these approaches can benefit from important opportunities that have economic implications. For example, these approaches can: (1) help avoid or resolve situations of conflict around mine closure that could be costly for companies; (2) support the achievement of companies visions and commitments for a positive legacy that are important to stakeholders and of interest to shareholders and investors; (3) contribute to the company's reputation for responsible closure that can help secure future approvals for mining contracts; and (4) bring in additional sources of funding to support positive socio-economic transition outcomes.

How much do multistakeholder approaches cost?

Costs vary enormously, from tens of thousands of dollars to establish and run mine closure consultative groups and monitoring committees to potentially millions of dollars or more for complex and long-term initiatives such as post-mining joint ventures.

Adequate funding needs to be reserved within the

mine closure budget for multistakeholder approaches or included in operational costs as part of ongoing transition resilience-building. These approaches lend themselves well to funding from a wide diversity of sources and, in many cases, mining companies have been able to leverage substantial amounts of funding from regional or national governments, international bodies, etc.

How can companies improve their contribution to successful socio-economic transitions?

The characteristics of mining companies constitute another set of determinants for the success of socio-economic transitions. Companies can strengthen their ability to support these transitions by, for example:

Rethinking closure planning. Companies can ensure that closure considerations form part of social performance and design decisions from the outset of a mining project. Successful socio-economic transitions are usually several decades in the making, so starting early is essential. Equally, it is also important to give socio-economic transition issues adequate weight in closure planning discussions, as they can sometimes be viewed as secondary to compliance issues such as environmental rehabilitation. This would better enable companies to plan for strengthening community resilience to closure by addressing the following kinds of issues from the earliest possible stage: economic diversification, skills development, capacity building, and agreements for post-closure management of company-supported activities.

Being open about the challenge. Companies can make sure they are providing clear and early communication to all key stakeholder groups on the timeframe of closure and what is being planned. Open and early discussions with others will help companies identify potential impacts and plan mitigation measures.

Sharing the challenge. Successful transition outcomes rely on companies bringing others (such as government, community leaders, labour unions and civil society groups) into the circle to identify, support and implement socio-economic transition strategies.

Strengthening transition capabilities. Companies generally lack sufficient capabilities to be able to manage socio-economic transitions effectively.

This includes, for example, the ability to conceptualise post-closure scenarios, and identify and assess options for repurposing assets for the benefit of local economies. Companies can help address this gap by developing in-house expertise in economic development planning, community and government relations, and partnership approaches, etc.

3.4 Understand your stakeholder groups

Socio-economic transitions tend to have far-reaching impacts that affect a wide range of stakeholder groups. Successful transitions will require the involvement of

multiple stakeholder groups that bring their own knowledge, perspectives and insights into the search for sustainable outcomes. Some of the main stakeholder groups of relevance to these transitions are shown in Table 4.

Table 4. Some key stakeholder groups concerned with socio-economic transitions linked to mine closure

Stakeholder group	Common concerns about socio-economic transition
Mining employees and their families	Loss of employment and any social benefits provided by the mining company; ability to find other work in the area
Contract workers and their families	Loss of income; ability to find other work in the area
Local businesses	Loss of revenue, loss of key market, risk of economic downturn
Local communities	Loss of social programs and infrastructure supported by the mine; outmigration; risk of social and economic decline
Indigenous Peoples	Changes in land ownership, meaningful participation in decisions related to post-closure and reclamation activities, implementation of any company commitments set out in agreements
Civil society organisations	Resolution of socio-economic or environmental legacy issues
Local government	Reduced tax revenue; reduced contributions to development programs; increased unemployment; future status of mine-supported social infrastructure and services
Regional and national government	Loss of revenues from mine; impacts to trade balance if mining operation is significant; environmental legacy issues; reduced attractiveness of region for other industries

Based on: World Bank. 2021. Mine Closure: A Toolbox for Governments.

In cases where mining companies are convening multistakeholder collaborations, they will need to consider which stakeholder groups to involve and understand the relationships between these stakeholder groups and how this may affect the functioning of any multistakeholder approach.

Decisions on which groups to involve should take into account the following factors:

- The rights and responsibilities different groups have in relation to different aspects of transition (such as land rights or statutory duties).
- The contributions that different groups can bring to the table, such as knowledge, expertise, funding and perspectives.
- The extent to which the different groups can impact, or be impacted by, the transition outcomes.
- The responsibilities that the company has towards specific groups, based on international treaties,

national regulations, site-specific agreements or other requirements and commitments. This includes the responsibility to respect the rights of Indigenous Peoples and their rights to lands, resources and cultural heritage through obtaining agreements that demonstrate their free, prior and informed consent (FPIC).

 The level of agency of different groups, in terms of their authority, capacity and decision-making power.

Local stakeholders clearly have the most to lose if socio-economic transitions are not managed well. With most at stake, and with the closest knowledge about local needs, communities, Indigenous Peoples and workers within a mine's zone of influence would need to be involved in any multistakeholder approach focused on local-level transitions. Other stakeholders, such as local and regional governments and private sector actors will have important roles to play in post-closure revitalisation of the area, so their involvement in multistakeholder approaches is often necessary.

Encouraging inclusion

When participating in multistakeholder approaches, companies can help ensure that these processes do not simply reinforce existing patterns of inequality and social exclusion. Companies can encourage more inclusive representation that focuses not only on formal leaders but also considers other bodies (e.g. women's groups, youth organisations and tribal councils) as well as representation from vulnerable groups (e.g. the elderly, people with disabilities and ethnic minorities).

Gaining an understanding of how different stakeholder groups relate to each other will be valuable when considering how the groups may interact as part of a multistakeholder body or process. For example, if a local NGO is reliant on funding from an international development agency operating in the area, the NGO representative may tend to defer to the agency counterpart during collaborative decision-making. Likewise, if two organisations represented in the multistakeholder body are in conflict with each other over an environmental issue, this may colour the interactions of their representatives during discussions on other matters.

Relevant tools for learning about stakeholders and their interactions include:

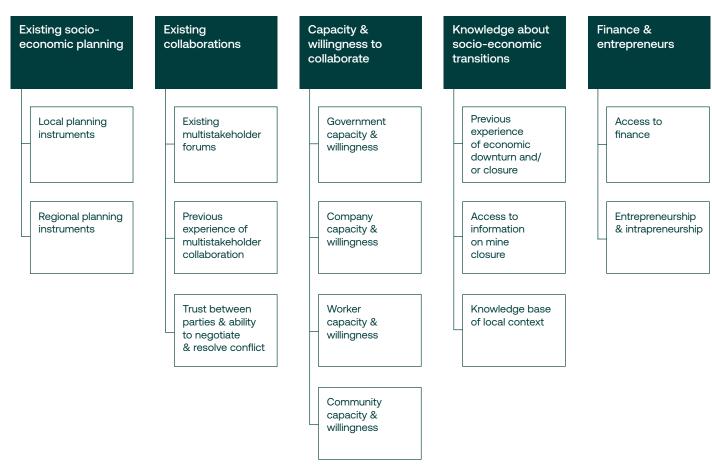
- Tool 1: Multistakeholder readiness assessment
- Tool 2: Stakeholder network mapping
- Tool 3: Partner capability assessment

For more information on stakeholder identification and analysis in the context of mine closure, see ICMM. 2023. Integrated Mine Closure. Good Practice Guide, 2nd Edition. London: ICMM.

3.5 Enabling conditions and success factors for multistakeholder approaches

A combination of factors will determine the ease with which multistakeholder collaboration can be achieved. However, there is limited analysis to date on the enablers for collaboration in the context of socioeconomic transitions. Figure 6 shows some of the key factors which emerge from case studies and broader literature. Importantly, mining companies can play a role in improving many of these factors (e.g. by building the capacity of local communities and investing in relationship building with government) and hence improving the environment for establishing and implementing multistakeholder processes.

Figure 6. Enabling conditions for multistakeholder approaches to socio-economic transition



There are an increasing number of examples of collaborative approaches to manage transitions.

Different multistakeholder approaches develop in different contexts. Although every situation is unique, successful multistakeholder approaches tend to share

some of the same characteristics. Some of the more common success factors are outlined in Figure 7. Again, mining companies can contribute to the effectiveness of these approaches by exhibiting and encouraging these kinds of characteristics.

Figure 7. Common success factors for multistakeholder approaches

Strong leadership

- Passionate, principled and competent individuals
- Effective coordination and administration
- Where necessary, independent facilitation
- Willingness to cede control to others

Active, open and appropriate engagement

- Commitment to equity, transparency, and mutual benefit
- Consistent, respectful, and trusting relations between key players
- Mutual appreciation of the role, capacity, power, concerns and risks of participants
- Inclusive engagement processes that address potential barriers, especially for vulnerable and marginalised groups
- Openness to different perspectives and innovative approaches

Clear systems and processes

- Common purpose, vision, rationale, or strategy
- Defined principles, rules, and procedures
- Clear governance structure, including processes for inclusion of participants
- Assigned roles and responsibilities for participants
- Systems for tracking and monitoring processes and outcomes
- Transparent reporting processes

Commitment of adequate resources

- Secure financial resources to support the multistakeholder mechanism
- Appropriate commitment of time by participants
- Support to accessing traditional, local and specialist expert knowledge, where required
- Support to capacity building of participants, where appropriate
- Transparent processes for financial accountability



3.6 General principles for using multistakeholder approaches

When planning or considering a multistakeholder approach, particularly those that involve structured bodies or processes, the following general principles may be helpful.⁸

Process design

Invest sufficient time and resources in the design of the approach. A poorly designed process can result in problems later on, such as stakeholders walking away from the collaboration, the multistakeholder body being unable to agree on decisions, or the identified activities not being implemented. If a multistakeholder approach fails, it can make the socio-economic transition worse than before, as these collaborative approaches raise stakeholders' expectations. A failed attempt may increase conflict, undermine trust, confirm entrenched views and reduce stakeholders' willingness to collaborate in the future.

Make the design phase a multistakeholder process itself. As early in the process as possible, initiating bodies should bring together a small group of representative stakeholders to serve as co-designers of the multistakeholder body or process.

Clearly define the goals of the multistakeholder approach. All participating stakeholder groups need to be clear about, and in agreement with, the goals of the multistakeholder body or process they are involved in. The goals may change over time but any changes will need to be agreed on by consensus.

Adopt a learning approach. All participating stakeholders need to embrace a learning and listening approach, and there needs to be some flexibility for the multistakeholder body or process to adapt to new information or evolving circumstances.

Cultivate a culture of respect. All stakeholders should feel heard and safe to express their viewpoints, including on issues where opinions may be strongly divided.

Be transparent about the process. Multistakeholder bodies and processes should publicly share summaries of their discussions and decisions, including who was involved, what issues were raised, and if and how agreement was reached.

Build in sufficient time for multistakeholder collaborations. Without adequate time, the stakeholder representatives will not be able to check back with their constituencies and bring wider input into the discussions. However, there should be an agreed timeframe for the multistakeholder body or process to produce the planned deliverables, in order to keep up the momentum and avoid cost overruns. Care needs to be taken to ensure that some stakeholder groups are not using the multistakeholder process to delay or block decision-making on socio-economic transitions.

Address issues of conflict. Conflict resolution techniques may need to be designed into the process. These could include, for example, facilitated mediation or fact-finding studies jointly designed by the parties in conflict. In cases where conflict could undermine the whole process, it may be more appropriate to start with conflict resolution before convening the multistakeholder group.

Operation

Support informed discussion. Where necessary, build the capacity of stakeholder groups, such as local communities and Indigenous Peoples, to participate fully in the identification of issues to address and in decision-making in matters that would affect them. This may involve providing access to information and other resources.

Maintain regular communications with all stakeholders involved in the multistakeholder body. Create a mechanism for sharing information and a 'home' for the knowledge base being developed by the group. Make sure sufficient resources are available for any translation necessary.

Carefully consider which stakeholder groups should be represented. Be clear and open about which stakeholder groups are being invited and the criteria used for their selection. Allow for a mechanism to invite other stakeholder groups into the process if gaps become clear. Ensure that logistical arrangements, such as meeting times or places, are not barriers for some stakeholder representatives to participate.

Be clear with stakeholders about what they can expect. Stakeholder groups need to be able to make an informed decision on whether or not they want to participate. Information should be provided on the role of the multistakeholder body or process, the level of commitment that will be required, and which other stakeholder groups are being invited.

Give each stakeholder group the responsibility to select their representative(s). At the same time, encourage an appropriate balance of diverse views (e.g. by requiring male and female representatives from each group).

Consider issues of agency when inviting government representatives. Clarify that participating government officials will need to have sufficient decision-making authority to ensure that the multistakeholder process can function effectively.

Provide independent facilitation. Multistakeholder bodies will ideally be facilitated by people who don't have a direct interest in the outcome of the process. The facilitator selected needs to be agreed on by all stakeholder groups involved.

Ensure resources are available to cover the operating costs and any capacity-building needs. If sufficient resources are not available, there is a risk that the multistakeholder process will be inequitable as better-resourced stakeholders will be at an unfair advantage. Participation requires resources to help individuals prepare for and attend meetings, consult with their communities, and build their capacity to contribute effectively.

Agree at the start on decision-making processes.

Consensus is the preferred method of decision-making because it generates commitment by all involved. The need to seek consensus will encourage participants to find an agreement that incorporates all points of view. Consensus may entail unanimous agreement or a willingness of some groups to step aside and accept the majority-approved agreement even if they have reservations about it.

Allow time for discussions before decision-making. Balance the need for constructive discussion with the risk of seeking compromise too early in the process, in order to foster the emergence of innovative and integrative solutions. Keep the dialogue process going until all ideas have been considered and encourage participants to deliver maximum creativity. The facilitator can play an important role here. Premature consensus tends to lead to decreased commitment and can be an obstacle to implementation.

Enable stakeholder groups to meaningfully participate in decisions that will directly impact their lives. This should especially consider the right of Indigenous Peoples to participate in decision-making in matters that would affect them and their rights, and the importance of due diligence processes that are guided by the principles of FPIC. They should be able to meaningfully participate in decision-making and freely agree, or not agree, to anticipated impacts on their rights and to the terms under which those impacts will be managed.

Agree on a timeframe for the multistakeholder process. Agree with all stakeholder groups about the cut-off points and criteria for closing down the process, in cases of both success and failure.

How do multistakeholder approaches fit with other concepts and approaches?

Multistakeholder approaches for socio-economic transition align well with related approaches and concepts in the mining industry. A few examples of these complementarities are outlined here.

Integrated mine closure. Multistakeholder approaches support an integrated approach to mine closure by enabling companies to focus not so much on closure but on the continuation of local communities and local economies. These approaches can address environmental as well as socio-economic issues associated with transitions from a mining context to a post-mining one.

Human rights. Multistakeholder approaches can be an effective means of ensuring a human rights approach to socio-economic transitions, by supporting the right of Indigenous Peoples and local communities to self-determination, giving them voice and agency in decisions that will impact their future.

Just transition. Multistakeholder approaches can contribute to just transitions by strengthening the capacity and agency of local communities, Indigenous Peoples and former mining workers, so they can actively participate in planning and implementing initiatives to mitigate transition impacts.

Landscape approach. Multistakeholder approaches align closely with a landscape approach as they position mining companies within an ecosystem of other stakeholders rather than as the key decision makers in the landscape. By bringing a range of expertise and perspectives to bear on transition planning, multistakeholder approaches can support a broader view of how to address socio-economic and environmental matters.

Social investment. Multistakeholder approaches can be used to plan, implement and monitor social investments, based on a shared vision and a collaborative approach with mining companies taking a co-participatory rather than a lead role. These approaches take a post-closure time horizon for social investment planning.

Partnership approaches. Multistakeholder approaches are strongly aligned with partnering approaches, with the key element that a mining company is not the lead partner in a multistakeholder approach.

Social licence to operate. Multistakeholder approaches can help build trust and foster constructive relationships with local stakeholders, thereby supporting companies' social licence to operate and equally a 'social licence to close'.

Types of multistakeholder approaches



Overview of types of multistakeholder approaches

The nine types of multistakeholder approaches covered by this handbook are presented in **Table 5**, grouped in four broad functions: convening, planning, implementing and monitoring. The main distinguishing features of these different types of approaches are outlined in **Table 6**.

Table 5. Nine types of multistakeholder approaches

Multistakeholder approach	Description		
Convening			
Mine closure consultative groups	Groups formed to gather input from a diverse range of stakeholders to inform mining company closure planning and decision-making.		
Planning			
Collaborative regional planning processes	Forums where stakeholders collaboratively develop plans at a regional, landscape or watershed level and often led by groups other than a mining company.		
Community-level transition initiatives	Initiatives convened to plan and/or implement measures to manage community-level action to cope with the transition away from a mining-dominated context. These are often led by local government.		
Implementing			
Regeneration/development coalitions	Coalitions of different organisations typically focus on both planning and implementation to manage economic regeneration, skills development or significant remediation or repurposing efforts. Often with significant NGO involvement.		
Social investment transition foundations, trusts and funds	Grant-giving organisations focused on providing social investment funds and supporting development projects to address transition impacts.		
Land and asset trusts	Not-for-profit entities that manage and operate former mining assets, often owning land or facilities for the benefit of the community.		
Post-mining joint ventures	Joint ventures, often between a mining company and other partners (business, government or not-for-profit organisation) to implement usually commercial activities based around former mining assets.		
Economic development investment vehicles	Financial investment entities focused on funding the development of new businesses or investing in economic development. Often government funded.		
Monitoring			
Monitoring committees	Focused on monitoring and evaluating impacts prior to closure, during closure, and post-closure. Often convened by the mining company and involving a diverse group of participants.		

Table 6. Main features of different types of multistakeholder approach

Multistakeholder approach	Primary purpose	Participation	Power	Scope	Formalisation	Funding requirement	Typical primary lead group	Extent of current practice
Mine closure consultative groups	Planning	Inclusive (or selective if topic-specific, e.g. Traditional Knowledge)	Advisory	Focused on mining company closure plans	Structured or legally formalised where resulting from an agreement	\$	Company or local authority	Relatively common
Collaborative regional planning processes	Planning	Inclusive	Planning	Broad - regional	Structured	\$\$	Regional government or company	Rare, although more common in coal-dependent regions
Community-level transition initiatives	Planning/ Implementation	Inclusive	Planning/ Implementing	Broad – community level	Structured	\$\$-\$\$\$	Local or regional government	Rare
Regeneration/ development coalitions	Implementation	Selective	Planning/ Implementing/ Investment	Broad	Structured – sometimes legally	\$\$\$	Civil society, business or government	Very rare
Social investment transition foundations, trusts and funds	Implementation	Selective	Grant-making and investment	Focused - social issues	Usually legally formalised	\$\$\$	Company or local government	Relatively rare
Land and asset trusts	Implementation	Selective	Management and stewardship	Focused – asset specific	Legally formalised	\$\$\$	Company – NGO partnership	Rare
Post-mining joint ventures	Implementation	Selective	Management and stewardship	Focused – assets/project specific	Legally formalised	\$\$\$	Company and other business, government or NGO partnership	Less rare than other approaches, but not common practice
Economic development investment vehicles	Implementation	Selective	Financial investment	Focused – issue/project specific	Legally formalised	sss	Regional government	Very rare
Monitoring committees	Monitoring	Inclusive	Review and oversight	Broad	Structured	\$	Company	Relatively common, but rarely with a post-closure focus

Legend for funding requirement: \$ = limited funding required (typically in scale of US\$10,000s); \$\$ = moderate funding (typically in scale of US\$100,000s); \$\$\$ = substantially funding (typically in scale of US\$1,000,000s) or more)

It is important to note that these nine types of approaches are complementary. Each of the approaches can be used in combination or in sequence with others. Each approach has its own advantages and disadvantages, as shown in Table 7, and its own timeline, as illustrated in Figure 8.

Selecting the appropriate multistakeholder approach to use will depend largely on the purpose for which a collaborative approach is being considered.

The typical roles that mining companies play in the different multistakeholder approaches are outlined in Table 8.

Table 7. Advantages and disadvantages of different types of multistakeholder approaches

Type of multistakeholder approach	Advantages	Disadvantages		
Mine closure consultative groups	 Provides an opportunity to build trust with specific stakeholder groups Provides a useful mechanism for hearing stakeholders' concerns and ideas Relatively inexpensive to establish and run Not very time-consuming 	 Participants' views may not be representative of the wider stakeholder group Power imbalance may skew decision-making towards interests of certain stakeholder groups 		
Collaborative regional planning processes	 Particularly useful in larger areas undergoing socio-economic transition Can generate consensus and ownership around an economic diversification strategy Provides an opportunity for a wide range of stakeholder groups to collaborate, beyond those directly impacted by the transition 	Can take several years to complete Requires strong knowledge base and spatial planning expertise		
Community-level transition initiatives	 Provides a mechanism for planning and implementing local-level socio-economic initiatives Fosters a shared vision among local community stakeholders about a post-mining future Can be initiated long before closure for maximum impact 	Can become politicised Local communities may be reluctant to discuss post-closure scenarios while the mine is still in operation		
Regeneration/ development coalitions	 Particularly useful for economic regeneration in post-mining areas Can be developed years after mine closure The inclusion of coalition partners such as local government, industries and universities facilitates high-impact projects Can be attractive for external investors and funders 	Can present governance challenges The different agendas of the coalition partners can complicate collaborative decision-making		
Social investment transition foundations, trusts and funds	 Provides well-established mechanisms for mining companies to support ongoing community investment post-closure Strengthens agency and capacity within local communities for identification, planning and implementation of social investment projects Facilitates investments that address priority needs within communities 	 Can take a long time to become operational so unsuitable for situations of sudden or forced closures Can be vulnerable to corruption, interference by strong interest groups, and poor financial management 		
Land and asset trusts	 Enables companies to make land and/or assets available for community use when formal relinquishment is not possible Can also be used in post-mining situations Can support restoration and innovative repurposing of mining land and/or assets 	 May not be appropriate in situations with significant liabilities associated with assets High level of funding may be required to address any remediation requirements in the event of damage or failure 		

Post-mining joint ventures	Suitable for complex, costly and lengthy postmining investments Involvement of actors such as private sector companies and universities encourages the identification of innovative projects These large-scale investments can generate spin-off projects that increase the overall impact	Can take years to raise sufficient funds for these investments Can be costly to maintain these long-term initiatives
Economic development investment vehicles	Suitable for large-scale investments in socio- economic development The investment vehicles can have a long lifetime, making them well aligned with lengthy transition processes Upfront endowments enable more ambitious and strategic investments	Usually administratively complex Project approval can be slow and inefficient
Monitoring committees	Supports local stakeholders to become involved in tracking progress and/or performance of transition initiatives Suitable for pre-closure or post-closure monitoring Can help build trust for companies' mitigation measures to address environmental impacts	Can be difficult to fund and sustain committee activities beyond closure Requires considerable capacity building on interpretation of monitoring data

Figure 8. When each multistakeholder approach might best apply during the mine lifecycle



Table 8. Typical roles of mining companies in different types of multistakeholder approach

Type of multistakeholder approach	Typical roles of mining companies	Description
Mine closure consultative groups	Convene Process lead	This type of approach is typically initiated and organised by companies.
Collaborative regional planning processes	Convene Co-participate Process lead	Most often these processes are initiated and led by local government, though there are a few companies that are using (and leading their own application of) this approach.
Community-level transition initiatives	Co-participateFinanceAdvocate	Companies typically play supportive roles and can engage with local governments to encourage these kinds of initiatives.
Regeneration/ development coalitions	ConveneCo-participateBuild capacityFinance	Company involvement varies widely depending on the context of these coalitions. In some cases, companies will play supportive roles, in other cases they will be active participants in the coalitions.
Social investment transition foundations, trusts and funds	ConveneCo-participateBuild capacityFinance	Although companies establish, finance and support these mechanisms, the company representatives on the governance bodies are co-participants rather than playing a lead role.
Land and asset trusts	ConveneCo-participateBuild capacityFinance	These trusts may be established by mining companies or by other stakeholders. Where trusts are set up in the post-closure period, mining companies may have little or no role, or they may be a source of financing and technical expertise.
Post-mining joint ventures	ConveneCo-participateFinance	Companies usually play an important role in setting up and financing these joint ventures, as well as co-participating in the management of these initiatives.
Economic development investment vehicles	Convene Co-participate Finance	While companies may have little or no role in government-run investment vehicles, they can play central roles in vehicles that operate as public-private partnerships or collaborations with other companies. This can include establishing the mechanism and financing its operation.
Monitoring committees	ConveneCo-participateBuild capacityFinance	Companies usually initiate these committees, convening the different parties, financing and co-participating in the committees' work. Companies can also strengthen the capacity of local stakeholder representatives on the committees.

Approach 1: Mine closure consultative groups

Typical level of company involvement:

- Convene
- Process lead

What are mine closure consultative groups?

Mine closure consultative groups are established by mining companies as consultative spaces where potential closure options are tabled and discussed, risks and opportunities identified, and decisions are taken on which options should be progressed. In some cases, the work of these consultative groups has resulted in significant changes to the original closure plan.

How do they work in practice?

Mine closure consultative groups generally include representatives from at least three stakeholder groups: local communities, local government authorities, and the mining company. Depending on the situation, other stakeholder groups represented may include, for example, traditional landowners and Indigenous Peoples' groups, local civil society organisations, state governments, national ministries and regulatory authorities, representatives of other businesses in the region and research institutes.

Consultative groups tend to be structured as committees, with a set number of positions reserved for each stakeholder group in order to balance the different perspectives represented. Some consultative groups have special provisions for including typically underrepresented community-level stakeholders, such as women and youth. Community representatives are expected to relay information from the group meetings to their communities and to share community feedback with the group.

The establishment of these groups usually involves drawing up a formal charter or terms of reference, setting out the purpose, composition, functioning and responsibilities of the body. In cases where company-community agreements require the establishment of mine closure consultative groups, these groups will have a formal legal status.

Mine closure consultative groups typically meet 2-4 times per year, though they can meet much more frequently when decisions need to be taken particularly regarding specific closure options. It is not uncommon for thematically or geographically based groups (or subcommittees) to be established alongside the main consultative group, in order to address specific issues in more depth and inform the consultative group of their findings and recommendations. These smaller groups usually meet more often than the main group.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 4: Community scenario planning and visioning

Tool 8: Town Transition Tool

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

Ideally, these consultative groups are established well in advance of closure (at least 5–10 years prior to closure) to allow time for shared learning and relationship building. Mine closure consultative groups are generally designed to operate until the final steps of closure have been completed, and a few continue to function post-closure.

What roles can mining companies play?

Most often, it is mining companies that make the decision to initiate mine closure consultative groups. Companies generally take the lead in organising the groups, scheduling and hosting the meetings, providing logistical support, and managing communications with the stakeholder representatives involved. However, once groups are established, other groups may take the lead in running the groups, setting the agendas or setting up subcommittees.

Importantly, companies are responsible for collecting and considering the recommendations developed during the group discussions, incorporating these wherever possible into socio-economic transition planning, conducting additional studies as required and reporting back on progress.

Prerequisites for success

- A certain level of social cohesion (for group members to be seen as credible and trustworthy representatives by most of the community).
- A reasonable level of stability within the membership of the group.
- Prior consultative/collaborative mechanisms used during the production phase (so involvement in engagement processes has been shown to be worthwhile).
- Willingness of representatives to share advice with, and seek advice from, others beyond their direct group.
- Openness by the company to take on board the comments and recommendations made by the group.
- Where necessary, a willingness from all parties to address legacy concerns and complaints as a means of building trust and developing a stronger relationship.
- Alignment with other ongoing consultative processes.
- Invite group participants onto the mine site so they can appreciate the physical aspects of the planned closure.

Potential limitations

- Power imbalances within the group can be difficult to overcome. Community representatives may disengage if they feel their voice is not being listened to.
- The topics of greatest importance to one stakeholder may vary significantly from those of importance to another, resulting in a challenge to dedicate sufficient attention to the interests of all stakeholders. This can be particularly pertinent when a company needs to collect feedback on design choices for regulatory/permitting purposes, while the interests of community members may be more focused on pending job losses, etc.
- With typically several months between meetings, it can be difficult to build and maintain momentum in the discussions and some group members may lose interest.

- Consultation within the committee may mean that decisions cannot be taken at the speed intended by companies and require an extension to the schedule for closure planning.
- The functionality of the group depends heavily on the individuals involved. The presence of hostile or disruptive group members can threaten the whole process.
- Local stakeholder representatives may bring long lists of complaints and demands, many of which may be outside of the scope of the consultative group's work.

What to avoid?

- Given the company's role in convening the group and the deference that may be shown by other group members, company representatives need to make special efforts to avoid dominating the discussions.
- For the same reason, the company representative should not be the sole Chair of the group.
- Don't forbid group members to share companyprovided information with their constituencies.
 Information on the mine that is presented to the group should not be considered confidential.
- Don't assume messages shared through these forums will necessarily be passed on to all community members – the company needs to ensure there are multiple channels for sharing information about closure plans.

One company held its first mine closure consultative group meeting near the company's regional base, far from the mine. This meant a bus journey of one and a half days for the community representatives in the group, whereas the company representatives could fly in by helicopter.

Good practice

- Keep up regular communication with the group in between meetings, and share minutes of each meeting in a timely manner. Share information beyond the direct group.
- Provide translation and interpretation into local languages, where necessary.

- Empower representatives to seek information from, and share information with, their constituencies.
- Ensure transparent and clear processes for appointing people to the group.
- If facilitators are used for group meetings, make sure there is agreement from all the group members on the choice of facilitator and make sure the facilitator is completely impartial, not favouring some viewpoints over others.
- Enable group members to appoint alternatives/ delegates in case they are unable to attend any meetings. Encourage a gender balance between representatives and alternatives/delegates.
- Ensure the group composition is representative of diversity within local communities.
- Wherever possible, maintain the same company representative throughout the duration of the group, in order to support continuity in the discussions and to help build trustful relationships with the other members.

- Show good faith by considering all the recommendations made by the group. If the company does not adopt any recommendations, inform the group as to the reasons for this.
- Where possible, enable the group to continue to function beyond closure planning, to oversee and monitor the implementation of the closure plan.

A mine closure consultative group, originally formed to assist with closure planning, was relaunched by the mining company 20 years post-closure, in order to strengthen multistakeholder collaboration on ongoing issues and provide advice to the company team that remained on site.

Another mining company established a mine closure consultative group some 20 years before closure was envisaged, to establish and maintain a dialogue with the mine's Indigenous partners about mine closure and to integrate Traditional Knowledge into the closure plan.

Key questions to ask when considering or planning mine closure consultative groups

What would be the main purpose of a mine closure consultative group?

What stakeholder groups would need to be represented?

What would be the most appropriate composition of the consultative group?

How can the consultative group ensure inclusivity, diversity, and equity in its membership and decision-making processes, to adequately represent marginalised and vulnerable community groups such as women, youth and Indigenous populations?

When should the consultative group be established and what preparatory steps are necessary?

Is the company required to set up a mine closure consultative group, based on a company-community agreement? If so, what conditions have been stipulated in the agreement regarding the group? Is there an existing consultative committee that could be modified to fulfil this role?

How will this consultative group work with other consultative or rights' holder groups?

Who are the key stakeholders that will drive or undermine the functioning of the consultative group?

What level of company management should be represented in the group's membership? How might this need to change over time?

What are the risks of failure for which mitigation measures may be required?

Is there a need for capacity building or conflict resolution measures prior to forming the consultative group?

How long should the group exist and how will the consultative group be maintained over time?

How will the group measure its success?

Diavik Traditional Knowledge Panel, Canada

The Diavik Diamond Mine, owned by Rio Tinto, is located in northern Canada. The mine was opened in 2003 and is scheduled to close in 2026. As part of an environmental agreement signed with First Nations groups in the area, an independent body was set up to monitor and support the implementation of the agreement. In 2011, this body, the Environmental Monitoring Advisory Board (EMAB), established a Traditional Knowledge Panel as a means to bring together traditional and Indigenous knowledge holders to discuss issues such as caribou conservation and mine closure planning. In 2013, the mine operating company became more involved in facilitating the panel and EMAB's role shifted to assessing the results of the panel's work and the company's responses. The company now leads the organisation of the panel meetings.

The panel is charged with providing recommendations to the company on social and environmental matters associated with operations and closure. Members of the panel are male and female elders and youth from the five First Nations groups with which the company signed formal agreements. The panel meets once or twice a year, with a format that includes a mix of presentations, semi-structured discussions, and formal talking circles. Each panel meeting addresses one particular topic, such as reconnection of open pits with the adjoining lake, post-mining monitoring

and performance, and identification of areas requiring revegetation support and those capable of natural recolonisation. The outputs of the panel meetings are formal recommendations to the company, which the company responds to and, where appropriate, addresses in project designs, environmental management plans and closure plans. To date, TK panel has made almost 300 recommendations to the company.

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- Environmental Monitoring Advisory Board.
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 traditional-knowledge-panels

Beenup Consultative Group, Australia

The Beenup mine, owned by BHP, was a sand mining operation in Australia that opened in 1997 and closed unexpectedly just two years later due to technical issues. When the company was seeking the necessary approvals for the project, only a minority of local community members were in favour of the mine and a significant number of people were strongly opposed to it. In response to this, in 1989, the company established a Beenup Consultative Group as a communication channel between the company and local stakeholders. This group continued to operate during the operational and closure phases of the mine.

From the start, the consultative group has included both those who were in favour of the mine and those who opposed it. Group members include representatives of local districts, landowners, business owners and conservation groups. One of the main concerns during the closure process was uncertainty about the likelihood of a successful rehabilitation of the site, given the impact of the mine on the landscape and the huge technical challenges involved.

The company presented visual scenarios of the main rehabilitation options to the consultative group to enable community representatives to understand the implications of these different restoration approaches. The options presented were based on final land-use goals that had been agreed on with the consultative group and other bodies prior to the start of the project. A series of workshops was organised to give the group's members an opportunity to discuss and understand the limitations and opportunities associated with the different rehabilitation options.

The input of the community representatives in the group played a significant role in the selection of the preferred option. As a result of their inputs, key changes were made to the closure plan, such as increasing the use of native vegetation in rehabilitation efforts, extending the revegetated area into another

zone of company-held land, and creating a connection between the revegetated area and the nearby National Park. This plan created a system of interconnected wetlands and ponds surrounded by natural vegetation that was suitable habitat for a range of waterbirds. The positive outcome of this collaborative process contributed to the mine site being given a national award for environmental excellence.

The consultative group was then involved in monitoring the implementation of the closure plan including the selection and tracking of rehabilitation completion criteria. This stage included regular site visits, meetings and workshops to discuss progress. Following a proposal by the company, the consultative group oversaw an independent audit of the process against the rehabilitation plan. One issue that threatened the collaboration was community distrust of the environmental data presented by the company. This concern was addressed when regulatory bodies became involved, an independent water monitoring station was established, and the company provided full transparency on all its environmental monitoring.

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Kelian Mine Closure Steering Committee, Indonesia

The Kelian mine in East Kalimantan, Indonesia was one of the world's largest gold mines until it closed in 2004. The mining operation, majority owned by Rio Tinto, brought important economic benefits but also had a history of community grievances and protests. Within this context, the operating company established a Mine Closure Steering Committee in 2000 as a multistakeholder decision-making body to address key social and environmental issues arising from mine closure. The committee comprised representatives of local and central government, a community organisation, a regional university, the operating company and Rio Tinto.

The committee was co-chaired by the head of the regional government and the President Director of the operating company. It was established with a formal charter and evaluation criteria were developed to enable its performance to be tracked. Notably, decisions taken by the committee had to be made by consensus. In addition, four technical working groups were formed with similar multistakeholder structures. The working groups researched, developed and recommended options to the committee which then took the final decisions.

A secretariat was created to support the work of the committee. Two external, independent facilitators (one local and one international) were appointed to assist in the design of the governance structure, to resolve disputes, to ensure that process targets were met, and to manage the committee and working group meetings.

The committee's work was made more challenging by ongoing unresolved grievances and the community organisation taking part in the committee claimed that it was being marginalised in the discussions.

Nonetheless, the decisions of Mine Closure Steering Committee were shared with the community and notable improvements were incorporated into the final mine closure plan.

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Raglan Mine Closure Plan Subcommittee, Canada

Glencore operates the Raglan underground nickel mining complex in Nunavik, northern Québec, Canada. Through ongoing dialogue with its Inuit partners from Salluit and Kangiqsujuaq, Raglan Mine identified their key concerns regarding mine closure practices, particularly tailings management. In response, Raglan Mine launched the Closure Plan Subcommittee. ⁹ The subcommittee was launched in March 2018 to establish and maintain a dialogue with the mine's Inuit partners about mine closure and to integrate the Traditional Knowledge of the communities of Salluit and Kangiqsujuaq into the environmental and social aspects of the closure plan for Raglan Mine. It is a subcommittee under the Raglan Agreement and its governing body, the Raglan Committee.

The subcommittee, composed of Inuit representatives, members of Makivik Corporation, Raglan Mine, and mine closure experts from TERRE-Net (a network of university researchers), aims to foster continuous collaboration. This multistakeholder

group allows for meaningful exchanges where technical expertise and Traditional Knowledge come together to help address the long-term impact of mining activities on the land. The subcommittee's approach emphasises learning, shared expertise, and the strengths of the Inuit communities to help shape a more sustainable closure plan.

The Raglan Mine is expected to remain operational for at least another 20 years. However, the proactive nature of this subcommittee has been instrumental in preparing for future closure. The 2024 Raglan Mine Reclamation Plan marked a significant milestone. For the first time at Raglan, the plan goes beyond technical requirements by integrating socio-economic considerations and the invaluable Traditional Knowledge from Salluit and Kangiqsujuaq.

Further information

Glencore. Raglan Mine Closure Plan Subcommittee.
 https://www.glencore.ca/en/raglan/sustainability/environment/Closure-Plan-Subcommittee

 $^{9.} For further information see {\tt https://www.glencore.ca/en/raglan/sustainability/environment/Closure-Plan-Subcommittee}$

Approach 2: Collaborative regional planning processes

Typical level of company involvement

- Convene
- Co-participate
- Process lead

What are collaborative regional planning processes?

Collaborative regional planning processes cover a wide range of multistakeholder approaches that are used to plan for the economic development of a mining region, often in areas where either a large mine or multiple mines are expected to commence or to close in the short-to-medium term. These processes focus on building economic resilience by planning for economic diversification at a regional level. As such, they can contribute to smoother and more successful socioeconomic transitions.

How do they work in practice?

Collaborative regional planning processes can take many forms. Some are company-led project-type initiatives that typically last for a year or two and consist of a combination of structured activities, deliberately sequenced to form a logical progression from data collection and analysis to strategic planning. More commonly, the processes are government-led or development institution-led, longer term, and less structured processes that move through a number of different phases as conditions evolve.

Activities undertaken in the context of structured collaborative regional planning processes can include, for example: (1) spatial and economic analysis of a region's resources and vulnerabilities to help determine potential development pathways; (2) scenario planning; (3) economic assessment of different scenarios; (4) analysis of sectoral opportunities and multisectoral synergies; (5) review of existing development plans of local, district and regional governments; (6) expert consultations, stakeholder engagement and partnership development; and (7) development of a strategic plan.

Activities carried out during larger scale collaborative regional planning processes may include, for example: (1) development of inter-institutional coordination and partnership mechanisms; (2) alignment of local-to-regional development plans; (3) collaborative planning by different levels of government, private sector actors, NGOs, and other stakeholder groups; (4) establishment of new regional-level governance platforms to oversee the planning work; and (5) engagement of local communities and (6) organisations to cascade the regional strategic plans down to local-level initiatives.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 5: Collaborative regional post-mining land use

(PMLU) suitability assessment

Tool 6: Repurposing assessment

Tool 7: Multistakeholder regional development

Tool 10: Regional skills transition planning

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

While collaborative regional planning processes are applicable throughout the mining lifecycle, they are best undertaken during the earlier stages of development and production, when design decisions can take into consideration the implications for potential regional development beyond the life of the mine. However, collaborative regional planning processes can still add value during later stages of production and even in the last few years prior to closure, though the later they are applied the more challenging it will be to buffer the region from the economic shock of closure. In some cases, they emerge in the years following closure or extended care and maintenance as a community or government led process to create new opportunities.

What roles can mining companies play?

Collaborative regional planning processes have tended to be government-initiated and government-managed. In these scenarios, mining companies will be among the stakeholder groups invited to participate in the planning work.

In a smaller number of cases, companies have initiated collaborative regional planning processes at the regional level, by commissioning the kinds of activities mentioned above. In these cases, the analytical and planning activities have generally been led by external consulting firms, on behalf of the companies.

Prerequisites for success

- A lead institution with sufficient authority, credibility and convening power to bring together the key stakeholder groups needed for effective regional planning.
- Funding for the collaborative planning process and any associated studies.
- Sufficient lead time (at least 2–3 years) to be able to complete the planning process and make a start on implementation of the regional development plan prior to a socio-economic transition.
- Credible data on which to base assessments and discussions of potential development opportunities.
- A corporate willingness to contribute to a wider, multisectoral vision of the mining region.

Potential limitations

- Regional planning relies on close collaboration between government bodies and the private sector.
 These parties may have different competing or conflicting objectives. The ability of these different stakeholder groups to reach a common vision for the region is by no means an assured outcome.
- Planning outputs can become outdated as conditions evolve. Planning for regional socioeconomic recovery and development will need to include a long-term horizon, covering several decades. During this time many new factors may come into play, potentially making the plan less relevant or realistic.

 Initiatives of this kind can often stop once the plan is complete, with little or no implementation. Without a strong and supportive institutional framework and considerable investment, planning processes may make little contribution to shaping regions' socioeconomic development.

What to avoid?

- When participating in government-led regional planning processes, avoid the company taking on a dominant role, as this can result in institutional stakeholders taking a more passive approach, thereby limiting the shared ownership necessary for successful outcomes.
- When undertaking company-initiated regional planning processes, avoid a situation where the company is the sole stakeholder responsible for organising the process. For example, create a multistakeholder steering committee or partner with another organisation to share responsibility.
- Avoid raising expectations for what the company would bring to these processes, and don't participate unless there is a reasonable chance that the company would be willing to contribute to the implementation of the regional plan that emerges.
- Avoid exacerbating the 'consultation fatigue' seen in many mining regions undergoing socio-economic transition, by engaging local communities in the planning process only if and when it is clear that adequate financial resources will be available to ensure that some community-level investments will be possible.

A local government initiated a collaborative regional planning process in a coal mining region, in order to develop a shared vision for its post-mining future. However, this initiative was initially opposed by the central government and the mining company, which were reluctant to openly discuss the end of mining in the region. It took more than six months before these key stakeholders began to engage in the collaborative planning process.

Good practice

- Undertake regular reviews and revisions of regional plans (e.g. every five years) to consider any major changes in economic conditions, policy environments, etc.
- Engage all relevant government departments and multiple levels of government in the planning process, to ensure alignment with existing planning processes.
- Identify potential sources of funding for implementation of the regional plan from the beginning of the regional planning process.
- Publicly share the outputs of these collaborative planning processes to enable wider input into the plans as they develop.

A collaborative regional planning project, initiated by a multilateral organisation, started with a formal stakeholder identification and analysis process. Through consultations with experts and those knowledgeable about the region, the project team compiled a spreadsheet of the key stakeholders and their main areas of competency and concern. This listing, which evolved as the planning work started, enabled the team to plan for preparatory meetings and multistakeholder workshops with these groups.

Key questions to ask when considering or planning collaborative regional planning processes

How can collaborative regional planning processes support the company's socio-economic transition efforts, and vice versa?

What entry points could the company use to encourage governments to support these processes?

For company-initiated regional planning processes, are the necessary data already available to support the assessment of future development opportunities?

What resources and expertise could the company contribute if it participates in this kind of planning process?

Which team(s) in the company would be best placed to represent the company in this kind of process?

How could the company add value to these processes, even if it doesn't get directly involved itself?

To what extent is the company prepared to support regional development activities which are external to its direct needs/benefits, but which support economic diversification?

What other organisations in the company's network could be brought into the process?

Latrobe Valley collaborative processes, Australia

The Latrobe Valley in Australia, historically a coal mining region, is now experiencing a major transition as the area's coal mines and coal-fired power stations have been closing or are slated for closure within the next decade.

A number of collaborative planning processes have been undertaken in the region over the last decade, including the creation of two new regional-level governance structures (as described below) and various participatory discussion forums that brought together stakeholder groups such as regional and departmental level government authorities, businesses and communities.

In 2019, as a response to the social and economic risks associated with these mine and plant closures, the state government of Victoria created the Latrobe Valley Authority (LVA) to encourage collaborative efforts for a sustainable economic transition. Until recently, the LVA was an independent body that institutionally belonged to the state government but had significant autonomy to determine priorities and distribute state support for the transition process. The LVA, which has since been merged into an existing state-level regional development agency, has partnered with stakeholders such as unions, adult

education providers and training organisations to promote economic diversification and supply chain regeneration and provide support for workers who have lost their jobs due to mine closures.

In 2020, the state government created another independent authority, the Mine Land Rehabilitation Authority (MLRA). This body works with the community, industry and government to ensure the transition to safe, stable and sustainable post-mining landforms. This is particularly important as the Latrobe Valley's brown coal mines are inherently unstable, fire-prone and require a range of active controls to prevent harm to human life and the environment. A related duty of the MLRA is to promote the participation of Latrobe Valley stakeholders in the implementation of the Latrobe Valley Regional Regeneration Strategy, which provides guidance to progress mine rehabilitation planning.

- European Commission. 2019. Latrobe Valley
 Authority, Australia. Case study. https://energy.ec.europa.eu/topics/oil-gas-and-coal/eu-coal-regions/knowledge-products-draft/latrobe-valley-authority-australia_en
- Mine Land Rehabilitation Authority.
 https://www.mineland.vic.gov.au/who-we-are/

Upper Nitra regional planning, Slovakia

In 2018, local authorities in the coal mining region of Upper Nitra, Slovakia, ¹⁰ initiated a participatory regional planning process for the development of the region beyond the life of the coal mines.

Citizens of the region were invited to express their interest to engage in the process. There were no limits set on the number of participants, and the sixty people who volunteered to participate included local civil servants, entrepreneurs, heads of schools or other institutions, and representatives of NGOs. Fifteen engagement meetings were held with this group, where they discussed and agreed on the priorities and pillars for the region's transformation. Working groups were formed around the three pillars identified (economy, mobility, and social infrastructure). The working groups were headed by regional experts and further support was provided by a national university. Meanwhile, a national environmental NGO provided communications support to increase awareness of the process and encourage wider participation.

The results of these consultations were provided to the national government, and they were later validated by local communities via public hearings facilitated by an external consulting group, which also carried out further data analysis to support the development of an action plan.

The costs of the initial consultation process were covered by the local authorities and by NGOs, while the validation and finalisation phase was financed through technical assistance funds from the European Commission.

One of the challenges faced by the organisers included the initial absence of the region's main mining company, which declined to participate in the consultation process, and an initial lack of alignment between different levels of government, as regional and national stakeholders were undertaking competing planning initiatives. Despite these challenges, the region's action plan was approved in 2019.

Further information

 Just Transition. 2020. From local initiative to national strategy: How citizens in Upper Nitra took control of their region's post-coal future. https://www.just-transition.info/from-local-initiative-to-national-strategy-how-citizens-in-upper-nitra-took-control-of-their-regions-post-coal-future/

Eastern Wielkopolska Territorial Plan for Just Transformation, Poland

Regional authorities in Eastern Wielkopolska, a coal mining region in Poland, initiated a systematic planning process for just transition of the region. The process, led by the Regional Development Agency (a quasi-NGO), has involved local government officials, NGOs, experts and scientists, industry organisations and employers, as well as other stakeholder groups.

Since 2018 these stakeholders have been participating in working groups to collaboratively plan the region's transformation, including the development of alternatives to coal mining, new jobs for mining employees, and business development. The recommendations developed by the working groups focus on the diversification of the region's economic structure, shifting the economy to modern and green technologies, especially in the field of energy, as the infrastructure and labour market competencies in this sector are two of the region's major strengths. These recommendations are being integrated into the region's Territorial Plan for Just Transformation.

The Regional Development Agency selected a national think-tank organisation to support the planning process by conducting an economic analysis

of the region, assessing the potential for jobs creation in the region and identifying the short- and longer-term steps required to ensure sustainable and balanced economic growth in the region. The organisation has also been identifying potential sources of finance to support the implementation of the Territorial Plan for Just Transformation.

This Territorial Plan for Just Transformation was developed in 2019 through a participatory approach involving the mining company in the region and mine workers' trade unions. With support from the EU Just Transition Fund, these stakeholder groups crafted plans to generate new job opportunities for individuals exiting mining and mining-related employment, to fund retraining initiatives, and provide other support measures for those impacted by the closures.

Further information

- Just Transition. Miners From The Coal Region
 Eastern Wielkopolska In Poland Have Ideas For Life
 After Coal. https://www.just-transition.info/miners-from-the-coal-region-eastern-wielkopolska-in-poland-have-ideas-for-life-after-coal/
- Instrat. 2020. Just transition in Wielkopolska region.
 https://instrat.pl/en/just-transition-in-wielkopolska-region/

Cesar and La Guajira regional planning, Colombia

In 2022, the World Bank funded a 10-month collaborative regional planning initiative in northern Colombia to develop an economic diversification strategy for Cesar and La Guajira, two departments heavily dependent on coal mining. The strategic planning work, undertaken by the consulting firm Dobbin International, combined spatial and economic analysis with broad-based stakeholder engagement.

The multistakeholder approach included a series of workshops at national and regional levels to gather information, identify opportunities and constraints, discuss the draft strategies, and validate the detailed action plans for both departments. These workshops included representatives of local, departmental and national government bodies, mining companies and other industries, business associations, financial institutions, labour unions, community leaders, universities, research institutions, and multilateral organisations.

The project generated a diversification strategy and action plan for each department, including specific investments in agriculture, tourism, infrastructure, energy, conservation and other sectors, as well as recommendations for national-level policy and governance measures. A multistakeholder governance body was recommended to be established, in order to oversee implementation of the action plans.

Further information

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 J. 2021. Spatial Planning for Resilient Economic
 Diversification: La Guajira, Colombia. International
 Development in Focus. Washington, DC: World
 Bank. https://documents1.worldbank.org/curated/en/246081621833185378/pdf/Spatial-Planning-for-Resilient-Economic-Diversification-La-Guajira-Colombia.pdf

Approach 3: Community-level transition initiatives

Typical level of company involvement

- Co-participate
- Finance
- Advocate

What are community-level transition initiatives?

These initiatives are structured and collaborative processes, undertaken at the local level, to develop strategic plans for priority investments aimed at strengthening community resilience to socio-economic transitions. In some ways, they are a smaller scale version of the collaborative regional planning processes outlined in the previous section.

How do they work in practice?

While each case of a community-level transition initiative will be unique, there are a few common features that characterise applications of this approach.

Local government authorities or town councils are most often the initiators of these collaborative projects and in many cases, they are undertaken in response to anticipated socio-economic transitions associated with mine closures, although they have been used in other contexts including the opening of a mine.

The initiatives generally involve the formation of a collaborative body such as a committee or a working group. This multistakeholder group is given the task of developing a strategy for improved community resilience. In some cases, a parallel process of wider stakeholder engagement is undertaken to elicit input from a greater number of community members.

The main stakeholder groups involved in these collaborative bodies are generally the local government, the local community and the mining company operating in the area. Other groups who may be represented include, for example, other companies, business associations, trade unions, NGOs, community-based organisations, Indigenous Peoples' organisations and regional government.

The scope of the strategic planning processes tends to be broad, encompassing economic diversification, job creation, business development, and community revitalisation.

The timeframe of these community-level transition initiatives varies considerably but they usually run for one or two years, culminating in the dissemination of the finalised strategy. In a few cases, provision is made for follow-up actions to review progress on implementation of the strategy and enable course corrections.

These multistakeholder planning initiatives are most commonly financed by local government, though in some cases the mining company provides some financial support.

It is not uncommon for the collaborative planning process to be accompanied by the creation of a transition fund to finance implementation. These funds often cover a number of prioritised areas of investment and in some cases, funding is set aside for local stakeholders to apply for co-financing for small-scale investment projects linked to transition objectives.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 4: Community scenario planning and visioning

Tool 8: Town Transition Tool

Tool 10: Transition outcome indicators

Where do they fit in the mining lifecycle?

Community-level transition initiatives will be most effective if undertaken at least a decade prior to any anticipated closure, to enable implementation of the strategic plans. However, there may be a lack of appetite among local communities to envisage a post-mining future until closure shifts from being a distant prospect to a clear reality. The initiatives will still be valuable at this later stage. Indeed, the sense of urgency triggered by a care and maintenance or a closure announcement can generate more interest and momentum for the initiatives. Transition initiative plans developed well in advance of closure will also need to be revisited to update them to accommodate changes in the social and economic context of the local community.

What roles can mining companies play?

Given the usual context of these initiatives, they are best undertaken with mining companies playing supportive rather than lead roles. Nonetheless, companies can add real value to the initiatives by, for example:

- Participating with other stakeholder groups in the collaborative body charged with strategic planning.
- Making available their expertise in due diligence and risk assessment to enable informed decision-making about PMLUs (some options that may seem attractive to communities, such as the development of tourism facilities or agro-industries, may not be economically feasible or manageable with existing capacities and resources).
- Financing or co-financing the operational costs of the collaborative body.
- Making available their in-house economic development experts (or financing the hiring of any external consultants) to advise the group discussions on transition opportunities.
- Supporting any studies that may be needed, such as community surveys or market analyses.

These kinds of initiatives are by no means the norm, so companies can have an important role in engaging with local governments and town councils to inform them of the opportunities presented by these community-level processes and to encourage their application.

Prerequisites for success

- Commitment from local government/town authorities.
- Interest within the local community.
- Sufficient funding and time to complete the collaborative planning process and associated studies.
- Shared understanding of the likely timeframe for mine closure and the necessary associated socioeconomic transition.
- Credible data on which to base assessments and discussions of potential development opportunities.
- Good facilitation of the collaborative groups to ensure they are productive.
- Finance to implement the strategic plan.

Potential limitations

- These initiatives often rely on community members volunteering their time, and participation in the collaborative body can be a considerable time commitment. It may be difficult to ensure community participants' involvement throughout the process.
- Local-level initiatives may be limited by the available technical and organisational capacities and capabilities. External support will often be required to fill the gaps.
- As with other planning processes, there is no guarantee that they will lead to implementation.
 Moving from a structured, time-bound planning initiative to the long-term, open-ended challenge of implementation can prove impossible, particularly if finance is not secured or responsibilities have not been assigned.

What to avoid?

- Avoid the community planning initiative being seen as critically dependent on the company.
- The company representative(s) in the collaborative body need to avoid taking on a dominant position in the discussions or a formal role such as co-chair.
- Avoid the initiative being 'hijacked' by a particular individual or interest group to push an agenda that may not fit with the priorities of the wider community. This will require strong but sensitive management to avoid disruption to the collaborative work.

A community-level transition planning initiative was started after mine closure was announced. The mine closed just a few months after this announcement, so the collaborative planning process took place under considerable time pressure and during a very difficult period for the community. The output of the initiative, a report detailing opportunities to revitalise the town, was presented to the government sometime after the mine had already closed. This left the community in a very vulnerable position.

Good practice

- Ensure that social and cultural as well as economic issues are adequately explored (e.g. via surveys and discussions on topics such as community vibrancy, the level of associative activities, sense of place and cultural identity post mining).
- When selecting community representatives for the collaborative body, encourage participation from groups that are often underrepresented and who will be most exposed to the pending socio-transition.
 This includes, for example, women, youth, the elderly, and those living with disabilities.
- When developing an action plan, include provision for regular reviews of implementation progress.
 Assign individual or organisational responsibility for overseeing the implementation of each of the main themes of the strategic plan.

Key questions to ask when considering or planning community-level transition initiatives

How can the company encourage local authorities to consider using this kind of initiative? What is the best time to engage with them on this topic?

How can the company contribute to such an initiative without taking on a dominant role?

How can the company's work on community engagement and mine closure planning help support this kind of initiative? And vice versa?

Mount Isa Futures Advisory Committee, Australia

Mount Isa Mines, a large mining complex owned by Glencore, has been operating next to the city of Mount Isa, in remote North West Queensland, for 100 years. The mines and the associated refineries and smelter comprise one of the world's largest mining complexes. In the second half of 2025, Glencore will be closing the copper mines and copper concentrator at Mount Isa Mines, and Lady Loretta (zinc) Mine, 140km to the north. Glencore plans to continue operating the zinc-lead mining and processing, and copper smelting operations in Mount Isa.

In response to the closure announcement in 2023, the Queensland Government set up the Mount Isa Transition Fund with US\$13 million to help prepare the local area. The primary objectives of the fund are to create jobs for the local workforce directly impacted by the closures, and strengthen the economy, small businesses, livability, and community resilience. To support the delivery of the fund, the Government created the Mount Isa and Region Futures Advisory Committee, which includes representatives from Mount Isa City Council, Mount Isa Water Board,

Glencore, a local business association, a trade union, a local social services NGO, a state-level industry association, an organisation representing traditional owners, and the Government. The role of the multistakeholder committee is to provide place-based advice to the State Government during reviews of applications to the fund.

To date, the Government has approved 10 projects for funding, which are estimated to support almost 500 local jobs in Mount Isa. Funded projects include upgrades to community infrastructure and sporting facilities, improved childcare services, the restoration of culturally significant community spaces, and enhancing local manufacturing capabilities.

Further information:

- Mount Isa. 2024. Response Plan Following 2025
 Closure of Copper Mining. https://www.mountisa.gld.gov.au/Latest-news/Response-Plan-Following-2025-Closure-of-Copper-Mining
- Queensland Government. Mount Isa Transition
 Fund. https://www.statedevelopment.qld.gov.au/
 industry/industry-support/mount-isa-transition-fund

Libiąż gender-responsive transition planning, Poland

The Polish coal-mining town of Libiąż initiated collaborative, community-based planning early in the transition process, in order to explore opportunities for positive change. One area of discussion in the meetings was: how can the transition benefit women as well as men? Traditionally, mining – the major employer in the area – was viewed very much as a man's job and women made up only a third of the economically active population in the town. This can have far-reaching consequences in a transition context. When unemployment increases among male miners, their female partners who are not working outside the home tend to experience higher levels of domestic violence, food insecurity and a decline in status. The shift away from mining to a more

diversified economic base offers new opportunities for women to participate in public life and in the economic future of the community. To support this shift, the town is introducing initiatives such as a workshop on women's role in the coal transition and skills development programs to help women find careers in renewable energy and other fields.

- World Bank. 2022. A Polish Coal Town Reimagines its Future. https://www.worldbank.org/en/news/ immersive-story/2022/11/02/a-polish-coal-town-reimagines-its-future
- Lahiri-Dutt, K. 2022. Just Transition for All:
 A Feminist Approach for the Coal Sector.
 Washington, DC: World Bank.

Collie Just Transition planning, Australia

The coal mines and coal-fired power plants around the town of Collie in Western Australia are anticipated to close within the next decade, which will result in a significant change to the region's economy.

In response to this situation, the government of Western Australia established a Just Transition Working Group in 2018. The working group comprises representatives from local industry (including mining companies), community, union and government stakeholders. The working group was established after the Australian Manufacturing Workers' Union and other unions and community groups made clear their view that a transition plan could not be developed without direct input from the local community. This point was recognised by government officials when it became clear that community meetings organised by unions were gaining far greater attendance than formal consultation processes with government ministers.

In 2020, the state government collaborated with the working group to develop Collie's Just Transition Plan. The plan is a statement of the government's commitment to working with the community and industry to create a more sustainable future for the region which mitigates economic dependency on coal production. It covers four focus areas: maximising opportunities for affected workers; diversification of the local economy; celebrating Collie's history and promoting its future; and ensuring ongoing commitment to the just transition.

Considering the existing vibrant economy in the area, relative proximity to Perth and the high level of research and development expenditure by businesses in the area (which is the highest in the country outside of capital cities), Collie has a strong adaptive capacity to transition to an economy that is more sustainable and less dependent on coal. The working group identified several industries it would like to see developed in Collie, based on what would be suitable in terms of location, the local skills base, job creation opportunities and local preferences of Collie's residents. These include an expansion of the local tourism and arts sectors and the introduction of industries on eco-concrete, battery storage unit manufacturing, engineered timber, wind turbine manufacturing and other new technologies.

Some of these projects are already being implemented, such as Stage 2 of Collie Battery, a grid-scale battery that connects to Western Australia's electricity grid using a transmission network. The primary aim of these plans is to create new, local, high-quality blue-collar jobs in the Collie region.

The Just Transition Plan covers a five-year period (2021–2025). Financing for implementation of the plan comes from the state government, including a US\$132 million Collie Industrial Transition Fund to drive new and emerging industries and create new local jobs, as well as investments totalling US\$11 million in local skills, training career advice and other initiatives to support the local workforce.

Alongside the government-run Collie Just Transition Plan sits another program, in support of the town's transformation. This is the Workforce Transition Program, an initiative run by Synergy, the Australian government-owned energy retailer and generator that runs one of the coal-fired power stations in Collie that is set to close by 2030. The program supports the power station's employees who have been or will be affected by the closure by offering them support in new career pathways. The personalised support of the program offers employees the opportunity to retire or to gain the skills required to find a new role either within Synergy or beyond. While the scheme was initially only open to Synergy's employees, the work of the Australian Manufacturing Workers Union resulted in the extension of the support program to contractors who were not directly employed by Synergy, but who nonetheless worked at the power station.

- Synergy. Muja Workforce Transition Program.
 https://www.synergy.net.au/About-us/Community-
 Investment/Muja-Workforce-Transition-Program
- Australian Energy Council. 2024. Just Transition:
 Case Studies Highlight Work Underway. https://www.energycouncil.com.au/analysis/just-transition-case-studies-highlight-work-underway/
- Government of Western Australia. Collie
 Community Fact Sheet. https://www.wa.gov.au/system/files/2023-08/colliecommunity-factsheet.pdf

Clermont Preferred Futures Steering Committee, Australia

The town of Clermont is in a major coal-producing area of Queensland. In 2007 the town faced a challenging 'double transition'. The nearby Blair Athol mine was slated for closure in 2012 while a new mine was to open near the town in 2010. The community of Clermont was to be impacted first by the vacuum created by the mine closure, including loss of employment, population, flow-on expenditure and services, and second by the disruption caused by the new mine in terms of increased population, added pressure on existing resources, and the creation of significant opportunities for further economic development.

In this context, the local government collaborated with the town and Rio Tinto (the owner of the Blair Athol mine) on a futures planning initiative called Clermont Preferred Futures. The year-long initiative aimed to guide the town towards a prosperous and sustainable future by capitalising on opportunities from past and planned coal mining, while decreasing its reliance on the industry.

The joint planning process started with a detailed literature review to analyse economic development strategies that had been undertaken elsewhere in order to identify success factors and learn lessons from past mistakes. A Preferred Futures Steering Committee was formed under the guidance of the local government and with funding from the mining company. The committee included representatives from local and state governments, existing regional planning groups, and the local community. Representation of different segments of the community (local businesses, farmers, youth, aged care, the Indigenous community, and community health and welfare) was embedded the composition of the committee.

From time to time, other people were invited to join the committee meetings, as needed. This included additional community or government representatives, and senior representatives from the mining company. In addition, a proactive communication and engagement strategy was developed to ensure wider involvement of community members.

A project support officer was appointed to support the operations of the committee. The committee also engaged an independent chair/facilitator from the regional development unit of a local university. This person was tasked with ensuring that the committee worked in an effective and time-efficient manner, as well as providing strategic insights, technical advice, and constructive but challenging feedback as needed to the committee.

The results of the discussions during committee meetings and from community and stakeholder discussions were organised into a Preferred Futures Strategy under six main themes: (1) business, entrepreneurship and economic development; (2) infrastructure, investment and transport; (3) leadership and governance; (4) liveability and lifestyle; (5) natural capital and cultural heritage; and (6) community health and wellbeing. Further discussion and analysis explored a wide range of sub-themes and identified key constraints and opportunities for Clermont's transition.

The resulting strategy was finalised in 2008 and had a time horizon to 2020. The strategy outlined a number of goals and actions to achieve each of the themes. A series of four-yearly reviews and evaluations tracked progress on the implementation of the strategy and guided improvements.

Further information

Everingham, J-A. and Mackenzie, S. 2019.
 'Assessing social impacts of mine closure'. Centre for Social Responsibility in Mining, Sustainable Minerals Institute. https://conferences.iaia.gorg/2019/uploads/draft-presentations/714_
 Everingham_Assessing%20social%20impacts%20 closure.pdf

Bowen Basin Smart Transformation Project, Australia

In 2019, the mining company BHP Mitsubishi Alliance launched the Smart Transformation Project as a means to help two mining communities in Queensland's Bowen Basin to mitigate the impacts, and seize the opportunities, associated with its increasing use of new technologies such as automated haulage.

The company convened a Smart Transformation Advisory Council in each town, which includes community members, representing a wide range of sectors, and the general manager of the relevant mine. The volunteer community representatives are tasked with engaging locally with their friends, family and work colleagues to identify the challenges and opportunities of the new technologies, and to pursue priorities to help future-proof the community in the face of technological change. A separate Smart Transformation Youth Advisory Council, composed of local high school students in the area and the two general managers, was also established.

While the company is an active participant in this project, the collaborative initiative is independently facilitated. Through the work of the advisory councils and extensive community consultation, a community roadmap has been developed, focusing on three themes: (1) skills and training; (2) business opportunities; and (3) community wellbeing. Implementation of the roadmap is ongoing and achievements to date include, for example, improving the digital connectivity of both towns, and scoping the opportunities for the towns to participate in innovation projects, research, testing and manufacturing in the region.

Further information

BHP. 2023. BMA Smart Transformation Project.
 https://www.bhp.com/news/case-studies/2023/08/bma-smart-transformation-project

Gove Peninsula Futures Reference Group, Australia

The closure of Rio Tinto's Gove bauxite mine involves a multistakeholder approach to social transition planning, with a strong focus on the involvement of Traditional Owners and key local organisations. This collaborative effort aims to ensure a positive postmining future for the Nhulunbuy region, where mining is expected to cease by the end of the decade.

In 2019, the Gove Peninsula Future Reference Group (GPFRG) was established, comprising Rio Tinto, Gumatj Aboriginal Corporation, Rirratjingu Aboriginal Corporation, the Northern Land Council, the Australian Government, and the Northern Territory Government. The GPFRG's work includes addressing transitional issues, visualising land rehabilitation using technology, and fostering economic diversification through initiatives like the establishment of a not-for-profit organisation to support business growth and affordable housing.

The approach emphasises the importance of First Nations peoples as landowners, cultural custodians, and key economic stakeholders. Traditional Owners' active involvement in the GPFRG allows them to

contribute to and shape the region's post-mining vision, which envisions Nhulunbuy as a continuing hub for education, health, and economic development. Data-driven studies, such as socio-economic impact assessments (SEIA), are central to this process, and the GPFRG collaborates closely with the study teams to assess potential outcomes and refine planning scenarios.

A key challenge of this collaborative approach is the need for compromise and openness from all stakeholders, including Rio Tinto. The process requires a shift from the operator-led model to one in which multiple parties share responsibility and contribute to decision-making. It also demands sophisticated engagement skills to maintain trust and effective collaboration. Despite these challenges, the approach has been successful in generating meaningful input from all parties, leading to a sense of confidence for more comprehensive and sustainable outcomes.

Further information

 Northern Territory Government. N.d. A New Journey Together. Webpage. https://govefutures.nt.gov.au/

Approach 4: Regeneration/development coalitions

Typical level of company involvement

- Convene
- Co-participate
- Build capacity
- Finance

What are regeneration/development coalitions?

Regeneration/development coalitions' is an umbrella term covering a wide range of initiatives that share the following characteristics: (1) they are formal partnerships that bring together different interest groups around a common set of goals related to economic revitalisation; (2) their primary aim is to address the needs and interests of local communities while catalysing the regeneration/restoration of areas impacted by former mining activities; and (3) their purpose is to not only plan but also implement (or finance the implementation of) local projects that align with the coalition goals.

How do they work in practice?

While the structure and functioning of these coalitions will vary from one case to the next, the more common practical features are outlined here.

Coalition members often include local businesses and NGOs with strong community linkages. Other stakeholder groups represented may include mining companies, community leaders, local residents, local and regional governments, regulators, and research and consulting organisations.

The initial impetus for forming the coalition can come from industry, government and local communities.

The overall goal is usually to involve different stakeholder groups that bring complementary capacities and can unite around a common set of objectives, even if their primary interests may be very different.

The coalition members establish formal procedures for regular meetings and consulting with local communities on priority concerns and potential solutions. Typically, a steering committee or similar sub-group is responsible for defining and guiding the coalition's work.

The coalitions have structured processes for selecting and approving local projects for financing. In some cases, coalitions secure substantial funds that enable them to run small grants programs. This adds administrative and financial complexity and responsibility to the coalitions. In other cases, the coalition member organisations, in consultation with their local communities, plan projects and finance their implementation.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 3: Partner capability assessment

Tool 4: Community scenario planning and visioning

Tool 6: Repurposing assessment

Tool 7: Multistakeholder regional development

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

Regeneration/development coalitions are not necessarily associated with a mine or with any particular stage of the mining lifecycle. As the Upper Hunter Mining Dialogue case shows, these coalitions may start while mining activity is still very much present and as the Tin Coast Partnership case illustrates, coalitions can be equally applicable in areas where mining has stopped many years ago.

What roles can mining companies play?

The potential roles for mining companies in these coalitions will depend on whether mining is ongoing in the area. Where mines are still active, the mining company or the local mining organisation may or may not be involved in the initial discussions that lead to the coalition being established. In either case, mining companies can offer to participate in the coalition and/or support the work of the coalition by providing finance, technical assistance, capacity building, etc. Mining companies may also become involved in these coalitions from a legacy perspective, either through legal mechanisms or through reputation management associated with legacy sites.

Prerequisites for success

- Adequate capacity among the coalition members for the core activities that may include, for example, community consultations, fundraising, project planning and implementation.
- Effective governance procedures for administrative and financial management.
- Sufficient financial resources over the medium to long term in order to maintain and manage a steady pipeline of projects.
- Constructive, trust-based relationships between the coalition members.

Potential limitations

- The organisations involved in the coalition often have very different agendas, cultures and ways of working. It can take considerable time and effort to develop an effective collaboration.
- Without an intentional focus on inclusivity, coalitions may inadvertently prioritise the interests of more dominant groups and exclude historically underrepresented groups in decision-making processes and project implementation.
- Coalitions are generally established before funding has been secured for the implementation of the project-financing mechanism. Delays or setbacks in building a stable financial basis for the coalition can threaten its survival.
- Managing a portfolio of small community-led projects can stretch the governance capacities of the coalition, leading to risks of unfinished or ineffective projects and difficulties in tracing the use of funds.

What to avoid?

- Avoid the risk of mission creep by adhering closely to the goals of the coalition when reviewing project proposals. Proposals for innovative projects may sound very appealing, but they may not contribute to the revitalisation or regeneration of the area.
- Avoid getting caught up in local politics. Decisions around project approvals should not be influenced by whether it would be politically expedient to show support for particular sections of the community.

 Avoid the temptation to scale up to fewer and larger projects for the sake of administrative ease, if this will leave no room for the coalition to continue to support small-scale community-led solutions.

A coalition for post-closure rehabilitation involved national and regional governments as well as an engineering firm responsible for overseeing the remediation works and local contractors. A lack of clarity on the specific responsibilities of each of these stakeholder groups led to confusion among local communities. They found it difficult to know who was responsible for the different aspects of the rehabilitation program.

Good practice

- Select projects on the basis of their potential to benefit the broader community, with particular emphasis on those that promote inclusivity and directly support historically marginalised groups.
- Publish the project review criteria used when reviewing and selecting projects for approval.
- Publish annual reports to show the projects that were approved, the amounts of finance involved, and information on the status of their implementation. Include disaggregated data showing how the projects are benefiting different groups within the community (e.g. women, youth and Indigenous Peoples).
- Invite feedback from communities on the functioning of the coalition. Take into account the comments.

A multistakeholder coalition, focused on developing post-mining opportunities for a coal mining region, engaged with government ministries on wider issues about the area's future. The coalition successfully advocated for a revision of the overall plan for revitalisation of the region. The government invited the coalition to join this process, which enabled the group to have a much stronger impact than was originally envisaged.

Key questions to ask when considering or planning regeneration/development coalitions

Is there an opportunity for the company to convene a coalition with other stakeholder groups, to support local initiatives on regeneration and economic revitalisation?

If so, which groups would be most appropriate to include in the coalition? What can be done to ensure the coalition covers a range of perspectives while enabling it to operate in an effective manner?

In what ways can the company support the work of these kinds of coalitions? Are there appropriate opportunities to provide technical assistance or capacity-building support?

How can the company support these kinds of coalitions to secure financing?

Sudbury Regreening Program, Canada

The environment around the city of Sudbury, in Northern Ontario, Canada, faced serious environmental degradation due to logging, nickel mining and smelting activities that began in the late 19th century. By the 1970s, decades of Sulphur dioxide and heavy metal emissions had devastated the landscape, leaving over 250,000 acres of barren land and highly acidified soil and lakes, with the area often compared to a moonscape.

The process of environmental restoration has been driven by a unique collaboration between a variety of stakeholders. In 1973, the VETAC, City Council's Advisory Panel on Regreening was established to act as Sudbury City Council's advisory panel on regreening, bringing together a broad range of stakeholders and technical experts from government, academia, industry and the Sudbury community.

Following several years of research and site-specific trials, the Sudbury Regreening Program was formally launched in 1978. The program is a collaborative initiative involving government bodies, industries, local institutions, mining companies including Vale and Sudbury Integrated Nickel Operations (a Glencore company), and the community. The municipal government of Greater Sudbury generally coordinates efforts, while local universities, including Laurentian University, Cambrian College, and Collège Boréal, have contributed research and monitoring expertise to improve regreening strategies. In addition to these

stakeholders, Vale and Sudbury Integrated Nickel Operations provide significant financial support and resources for the program. Non-profit organisations like the Tree Canada also help fund and organise efforts, and the federal government, through the Employment & Service Development Canada and Natural Resources Canada, provides support for research and seasonal employment opportunities.

By 2024, the Sudbury Regreening Program has shown considerable progress, supported by investments totalling \$38.4 million (CAD) over 40 years, and resulted in the planting of over 10 million trees and recovery of over 25,000 hectares of land. However, challenges remain, including adapting to climate change, managing the spatially heterogeneous impacts of industrial activities, and ensuring that the regreening process is sustained long-term. The program also continues to evolve; it is exploring biodiversity solutions such as planting new species to cope with changing climates, and creating Regreening Management Units, which involve mapping watershed boundaries to help guide targeted interventions.

Further information

 Sudbury Regreening Program. Report and Publications. https://www.greatersudbury.ca/live/environment-and-sustainability1/regreening-program/pdf-documents/2024-regreening-annual-report/

Upper Hunter Mining Dialogue, Australia

The Upper Hunter Valley in New South Wales, Australia, has a high concentration of coal mines and is undergoing an important transition due to the phase-out of coal mining. Over the past ten years, four mines in the area have ceased production and others are approaching closure. In response to community concerns about the cumulative impacts of mining, the state's mining association established the Upper Hunter Valley Mining Dialogue in 2011. The dialogue initially focused on issues around infrastructure and services, mine rehabilitation, and water quality. More recently, discussions have addressed the need for economic diversification and regional redevelopment in order to enable a sustainable post-mining future for the region.

The dialogue brings together mining companies, community and business leaders, local residents, environment groups, regulators and other industries to collectively understand and address community priorities.

The dialogue operates through regular meetings and discussions between community members, private companies and government where each stakeholder can discuss their ideas regarding the development of the Valley's economic, social and environmental conditions. To date, the dialogue has successfully conducted several development projects, such as a study on alternative sources of funding to support the development of housing infrastructure in the region and a project for land rehabilitation.

In 2015, the dialogue established a Joint Advisory Steering Committee to ensure that the programs and projects emerging from the dialogue align with community priorities. Five working groups focus on themes such as environmental issues and social and economic development opportunities. Proposed projects are considered by the multistakeholder working groups which are responsible for reviewing proposed projects and submitting their recommendations to the committee for advice and/or decision on implementation.

Further information

 New South Wales Mining. 2021. The Upper Hunter Mining Dialogue. https://miningdialogue.com.au/wp-content/uploads/2021/09/Upper-Hunter-Mining-Dialogue.pdf

Tin Coast Partnership, UK

The Tin Coast in Cornwall, UK, is a stretch of coastline where the landscape has been defined by the historical tin mining industry that ended nearly 30 years ago. Since then, the area's industrial history has become a major tourism asset. In 2017, a group of local stakeholders established the Tin Coast Partnership to collectively plan measures to enhance the impact and role of tourism in the area. The founding stakeholder groups included the local town council, the county council, tourism operators, heritage and conservation organisations, a sustainable tourism consultancy, a local university, and a similar partnership-type organisation in the area.

The partnership set four overarching goals to redevelop the area and enhance tourism: (1) extend the tourist season and broaden the visitor base; (2) improve the visibility of visitor information; (3) make the Tin Coast an easy place to visit and move around; and (4) improve signage for residents and visitors.

The partnership meets as a steering group four times annually to review progress on its tourism destination management plan. Together, they set four overarching goals to redevelop the region and enhance tourism.

The partnership has received government funding which has enabled it to undertake projects such as the promotion of year-round community events, the opening of new trekking itineraries and the establishment of an electric car charging network.

One challenge that emerged during the process was the interest that businesses from outside the area showed in the redevelopment initiative. Some of these companies proposed new commercial projects for the Tin Coast that were not aligned with sustainable tourism principles. The partnership has had to find ways to balance the interests of tourists and local residents, while revitalising the region's economy.

Further information

Tin Coast. Background. https://tincoast.co.uk/
 evaluation/the-story-so-far/evaluation-report-the-background/

Reclaiming Appalachia Coalition, USA

The Appalachian region is a large swathe of land in eastern USA that was the country's main coalproducing region for more than 150 years. The long history of mining has had a huge impact on the region's landscapes, natural resources and society. The region has thousands of hectares of abandoned mine sites. In 2017, a multi-state coalition called The Reclaiming Appalachia Coalition (RAC) was created. The coalition consists of three NGOs, including a grassroots group advocating for healthy communities and environmental protection, a social enterprise organisation focused on poverty alleviation, and a rural network organisation promoting economic, social and environmental justice. Technical assistance and additional capacity are provided by an environmental and economic development consulting firm.

The coalition's priorities are environmental protection, workforce development and community-based revitalisation in the region. To date, the coalition has secured over US\$15 million from a government grant program that aims to support economic recovery in regions with abandoned mine lands. This funding has enabled the Coalition to leverage an additional US\$11 million of financing.

The coalition functions thanks to the cooperation between its members and their community stakeholders. Each of the three member NGOs works closely with their community members to identify places where the reclamation of former mine land could have a positive economic impact. With the support of technical experts, the coalition then develops these ideas into viable projects and helps local partners secure funding. Project implementation can be coalition-led or community-led, but in either case, the original ideas for the projects are developed entirely by the communities. The coalition has successfully implemented many projects, including the development of hiking trails and tourism facilities, and the restoration and repurposing of historical mining infrastructure.

Further information

Reclaiming Appalachia Coalition. A New Horizon:
 Innovative Reclamation for a Just Transition. https://appvoices.org/resources/AML-RAC/AML_RAC_
 report-2019-verJul2020-low-res.pdf

Approach 5: Social investment transition foundations, trusts and funds

Typical level of company involvement

- Convene
- Co-participate
- Build capacity
- Finance

What are social investment transition foundations, trusts and funds?

As used here, the term 'social investment transition foundations, trusts and funds' (FTFs) describes the range of independent, legal entities (with multistakeholder governance structures), which are established by mining companies to share benefits with local communities through investments that support sustainable socio-economic development beyond the life of the local mining operation(s). Specifically, this multistakeholder approach describes FTFs that have been designed to support the transition through closure or support a community post-closure. Not all FTFs have a multistakeholder approach and not all multistakeholder FTFs are established to exist beyond the operational period of a mine, so this description applies to only a subset of all FTFs.

How do they work in practice?

Social investment transition FTFs operate in different ways depending on their context and the specific requirements that have been set.

In some countries, companies are legally obliged to establish FTFs, and in other cases, the establishment of such structures is built into legal agreements that companies sign with local communities or Indigenous groups. Other companies choose to establish these vehicles as part of their community investment programs.

As legal entities, FTFs' governance structure, purpose and principles of operation should be set out from the start, however, their purpose and structure may evolve over time. Their multistakeholder governance structures (the Boards of Trustees) generally involve

representatives from the mining company, local government and local community organisations. FTFs may also involve public and private sector actors working on conservation and regeneration issues.

The FTFs receive funding from the mining companies that initiated them, for distribution as community project investments or to support a specific activity (e.g. funding for the management of a protected area). The funding available to an FTF can come either through annual contributions from the company or via a one-off endowment by the company (particularly in the context of mine closure). In addition, companies transfer land and/or assets to the trusts, which are responsible for using these for the benefit of local communities. FTFs typically seek to secure additional funding from external parties with high levels of co-financing considered an indicator of a successful FTF and a pre-condition for sustainability.

Closure-focused FTFs are designed and structured to continue operation beyond the closure of the mine. These can include 'future fund' initiatives where a portion of benefits allocated to communities are accrued to support the development aspirations of future generations, or FTF funds that are intended to support communities to build resilience to mine closure over time.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 3: Partner capability assessment

Tool 4: Community scenario planning and visioning

Tool 5: Collaborative regional post-mining land use suitability assessment

Tool 6: Repurposing assessment

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

The vast majority of FTFs are established during the development and operational phases, either as legal or agreement-related commitments, or in the context of companies' community development programs. This may mean that the responsibilities of an FTF can evolve as the capacity of the board of trustees or governance structure increases and as the company transfers to it the management of FTF activities, as closure approaches. In a smaller number of cases, FTFs are established by companies as closure approaches, as a means of continuing social investment activities undertaken by the company during the operational period into the future, or as a means of improving the likelihood of achieving a positive legacy after mine closure.

What roles can mining companies play?

Mining companies play a critical role in establishing and financing FTFs. If and when a mining company establishes an FTF, it has a responsibility to ensure the entity can operate in an effective manner to fulfil its purpose. This may require considerable time and effort to build the capacity of the Board of Trustees, and its executive and operations teams. The company may need to make available independent support such as technical assistance, organisational, governance and management advisory services. At the same time, the company needs to be cognisant of the risk of being seen as 'in charge' of the FTF. The company representative(s) in the FTF's governance body will need to take a co-participatory rather than leadership role.

Prerequisites for success

- Adequate capacity and capabilities within the trust to fulfil its responsibilities.
- A stable and predictable funding stream to allow for longer-term planning.
- A clearly defined strategic vision for the FTF.
- A multistakeholder governance body that is representative of local perspectives.
- Succession planning for the members of the Boards of Trustees.
- A level of administrative 'infrastructure' appropriate to the size and responsibilities of the FTF, to ensure fair and ethical practices without imposing a disproportionate burden on operations.
- Clearly defined criteria for approval of community grant projects.

Potential limitations

- FTFs have quite a long time lag before they are operational, given the financial and organisational arrangements required. This makes them unsuitable for situations of sudden or forced closure.
- The establishment and organisational development of these FTFs requires a considerable time commitment from the company's local teams, which can be difficult to manage.
- As small organisations with large amounts of finance, FTFs can be vulnerable to corruption, interference by strong interest groups and poor financial management.

What to avoid?

- Avoid any conflicts of interest within the governance body by ensuring that none of its members are direct beneficiaries of the FTF's grant-making program.
- Avoid making an FTF reliant on annual budget allocations as this will severely restrict its sustainability post-closure and will limit its ability to support long-term projects.
- Avoid the company having too strong a role in the FTF and direct control of any of the projects funded by the FTF.
- In managing the grants program, avoid focusing only on the immediate development needs without a longer-term vision for sustainability beyond the mining lifecycle.

A community benefit trust was governed by a Board dominated by representatives of the mining company. As the trust's identity was closely associated with the company, communities viewed the trust as a vehicle for the company to pursue its own interests.

Good practice

- Develop a Theory of Change for the FTF and revisit this regularly to verify if its work is aligned with its longer-term strategic vision.
- Provide capacity building for community members in developing grant applications. Ensure this support is available to groups that have historically been underrepresented.
- Partner with other groups such as NGOs, government agencies or local development actors to leverage additional resources and complementary skills.
- Publish and disseminate documentation on the operations of the FTF, including the eligibility and assessment criteria used when reviewing project proposals.
- Develop incentive schemes to encourage high-performing staff to stay with the FTF.
- Monitor the impacts of the FTF's work and publish the results.

When a Foundation received a large dividend, it partnered with a development consultancy firm to develop a long-term strategy in order to guide its decision-making over two decades. The goal was to ensure a lasting impact in the communities benefiting from the Foundation's investments. Based on this strategy, the Foundation then brought in external expertise to strengthen its operational capacity. Over a two-year period, expert teams transferred project management, governance, and technical skills to the Foundation's staff and to construction contractors at the project sites.

Key questions to ask about social investment transition foundations, trusts and funds

Are there any specific requirements or conditions for an FTF to be established?

What is the most appropriate financing mechanism for establishing and maintaining the FTF?

In setting out the governance structure for the FTF, which stakeholder groups should be included in the Board of Trustees? What level of seniority should be specified for the groups' representatives on the Board?

How can the company help support the FTF without taking on too dominant a role?

Inti Raymi Foundation, Bolivia

The Inti Raymi Foundation was established in 1991 by the Bolivian-owned mining company EMIRSA for the purpose of supporting the social and economic development of local communities within the area of influence of the company's two gold mines, Kori Kollo and Kori Chaca. The Foundation obtained legal status in 1993 and served 25 communities in the Department of Oruro.

The Foundation was originally focused on strengthening local people's capacity to supply the mine with local food and materials. However, by the end of its first decade of operation, the Foundation had clearly defined its purpose and achieved stronger community participation and financial independence from the company. The creation of a committee of beneficiaries, including representatives of local

communities and local government, meant that the Foundation's projects were better able to fulfil community needs and be aligned with regional and national development plans. As part of the closure process, the company transferred all community relations functions from the company to the Foundation.

As the mines' closure date approached, the company created three community funds to finance the region's socio-economic transition. Each fund was endowed with US\$1 million and a social monitoring committee with broad community representation was responsible for tracking social impact and program effectiveness.

Further information

Inti Raymi Foundation. https://intiraymifund.org/

Palabora Foundation, South Africa

The Palabora Foundation was established in 1986 by the Palabora Mining Company, which was originally majority owned by Rio Tinto until its sale in 2013. The company operates copper mines in Phalaborwa, Limpopo Province. The Foundation was set up as a non-profit organisation to deliver the company's social investment program, serving communities within a 50km radius of Phalaborwa. The Foundation has implemented education, skills development and training initiatives, as well as activities around health, business development, and tourism promotion. The Foundation has functioned in a collaborative manner, by presenting potential projects for consideration to community forums that include representation from each of the five tribal authorities in the area. Community members can also bring

project ideas to these forums. The Foundation's Board of Trustees includes representatives from local businesses, the mining company, local government and a traditional council.

Originally, the mining company provided 3% of its after-tax profit to the Foundation to cover its costs. In 2001, the mine withdrew this regular funding, and since then the Foundation has met its operating expenses from the interest earned on its investment fund as well as financing from other sources, including government and non-government partners and international donor organisations. Many of the Foundation's programs are no longer operational, partly due to budgetary issues.

Further information

Palabora Foundation. https://pafound.org/

McArthur River Mine Community Benefits Trust, Australia

Established in 2007, the McArthur River Mine Community Benefits Trust is an agreement between McArthur River Mine (MRM) and the Northern Territory State Government to support socio-economic development in the Gulf region, in consultation with local communities. The Trust aims to enhance the positive social and economic impact of MRM's mining operations, build infrastructure to support local jobs and enterprises, and create employment and training opportunities.

The Trust's Board of Trustees includes eight representatives of the four Indigenous language groups in the area, two local community representatives, one representative of state government, one representative of the mining company, and two independent trustees. Local

Indigenous Trustees have majority voting rights on Board decisions. The mining company provides annual donations to the Trust and finances its administration and management costs. A small team manages the Trust's day-to-day operations.

The Trust runs a grants program as well as its own programs and projects. As required under its open cut approval, MRM itself contributes nearly US\$1 million annually for the Life of Mine to the Trust. Altogether, over 160 projects have received more than US\$22 million in funding from the Trust. These projects support enterprise and job creation, social and community development, culture and art, education, health, and the environment.

Further information

 McArthur River Mine Community Benefits Trust. https://mrmcommunitytrust.com/about/

Mount Rosser Remediation Project, Jamaica

Rio Tinto has been working on the remediation of the Mount Rosser Red Mud Disposal Area for more than fifteen years. It was used as a red mud storage facility between 1959 and 1991, when it was owned by Alcan. Closure activities commenced in 2007 and are expected to be completed within the next five years.

During the course of the remediation activities, local employment opportunities have been prioritised, providing work to residents in the Mount Rosser community which is a small community with few other formal employment opportunities. In preparation for a reduction in the workforce associated with the completion of many of the remediation activities, an employment transition program was initiated as part of the community investment work of the mine. Building on lessons from the automobile industry and experience gained by Rio Tinto through the roll-out of similar transition programs in other closure settings, the program was tailored to the Mount Rosser setting and offered to current employees. It is designed to help employees prepare for an employment transition and help them identify and secure their next livelihood activity. The program is led by a consultant but draws on specialists in relevant fields to offer advice and guidance targeted to the needs and interests articulated by participants. At Mount Rosser, this included bringing specialists with expertise in

agriculture, business development and business planning to work directly with employees and to support them to develop a personal plan for their transition.

One of the challenges identified by employees in making their transition was that despite having years of experience and having received on-the-job training, they did not necessarily have certificates or qualifications to prove their skills to a future employer. Recognising this, the Mount Rosser team have been seeking to engage and work with a national network of technical vocational education and training colleges to formally recognise skills held by employees and provide additional training as needed. Such a collaboration has been made possible through a mechanism whereby all corporate taxpayers in Jamaica make an annual payment of 3% of the wage bill to this network of colleges.

- Alcan. 2006. Mount Rosser Rehabilitation Project.
 https://www.nepa.gov.jm/sites/default/
 files/2019-12/Mt.Rosser-Rehabilitation.pdf
- Rio Tinto. 2023. The slow journey from red mud to green plants. https://www.riotinto.com/en/news/stories/the-slow-journey-from-red-mud-to-green-plants

Approach 6: Land and asset trusts

Typical level of company involvement

- Convene
- Co-participate
- Build capacity
- Finance

What are land and asset trusts?

There are effectively five options for post-mining land and asset ownership: (1) the company retains the mining properties; (2) properties and assets are returned to the government; (3) properties and assets are sold on to a developer or a new entity; (4) ownership of land and/or assets is transferred to an arms-length special purpose vehicle with appropriate liability and insurance provisions; or (5) land and/or assets are transferred to local communities. The term 'land and asset trusts' is used here to refer to the transferal of land and/or assets to local communities. Rather than a simple asset transfer, land and asset trusts are designed to hold assets in trusts for communities. In addition to holding the assets themselves, land and asset trusts should include funding for unresolved liabilities which may be associated with assets and the costs of ongoing maintenance and monitoring.

How do they work in practice?

The overall purpose of land and asset trusts is to facilitate the productive or protective use of land and assets for community benefit in the post-mining period. Productive uses could include profit-generating activities (e.g. agriculture or energy generation from solar panels) and protective uses could include the establishment of protected areas or conservation zones which are managed at a community level. Trusts of this form are particularly relevant when the relinquishment of land or assets may not be possible due to the liabilities associated with them, but where an alternative use or continued community use could be beneficial. In the past, land or assets that could not be relinquished often remained unavailable for community use, whereas a trust option allows a community to gain access to these facilities/features without taking on the liabilities

associated with them. The use of these approaches is likely to increase with the implementation of the Global Industry Standard for Tailings Management highlighting the difficulties in relinquishing former tailings facilities.

Governance of the trusts is usually managed at the community level, with profits either redirected into the trusts for ongoing operation costs or distributed to community beneficiaries.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 3: Partner capability assessment

Tool 4: Community scenario planning and visioning

Tool 5: Collaborative regional post-mining land use suitability assessment

Tool 6: Repurposing assessment

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

Land and asset trusts can be established by companies as part of operational or mine closure planning processes. Trusts established by government bodies or civil society organisations tend to emerge in the wake of mines being abandoned or after extended periods of care and maintenance.

What roles can mining companies play?

Mining companies can play a critical role in identifying opportunities for land and/or assets to be put in trust for communities, and in establishing the financial vehicle and resources to support the establishment of the trust. The intention of establishing such a trust is to increase the level of community 'ownership' and use of assets or land in situations where formal transfers may not be appropriate. Where trusts are set up in the post-closure period, mining companies may have little to no role or may be a source of financing and technical expertise (in the case of facilities that may present geotechnical risk or other hazards).

Prerequisites for success

- Adequate capacity and capabilities within the trust to fulfil its responsibilities.
- A stable and predictable funding stream to allow for longer-term planning and to cover future operational and maintenance costs of assets.
- Early investment to support the growth of capital prior to the cessation of mining.
- Transparency in relation to future liabilities.
- A clearly defined strategic vision for the trust.
- A multistakeholder governance body that is representative of local perspectives.
- A level of administrative 'infrastructure' appropriate
 to the size and responsibilities of the trust to ensure
 fair and ethical practices without imposing a
 disproportionate burden on operations.

Potential limitations

- Land and asset trusts may not be appropriate in situations where the scale of liabilities associated with assets is significant. The capacity of the governance body to assess and monitor technical risks needs to be commensurate with the complexity of the asset being put in trust.
- Trusts need to be resourced or have access to resources at a level sufficient to address remediation requirements in the event of damage or failure.

What to avoid?

- Companies should not assume that trusts of this nature necessarily defray their liability for the asset.
- Avoid making a trust reliant on annual budget allocations as this will severely restrict its sustainability post-closure and will limit its ability to support long-term projects.

Closure planning had long identified a water retention facility as a potential asset transfer opportunity to an Indigenous community. The intention was to establish a trust to be managed by the community, covering the ongoing maintenance and monitoring costs of the facility post closure. As closure drew closer it became apparent that the nature of the geotechnical hazards presented by this facility made it inappropriate to expect that the liabilities could be transferred to a community trust, and a new future management plan was required.

Good practice

- When applicable, encourage the establishment of a governance structure that ensures adequate representation of groups such as women, youth and Indigenous leaders in decision-making roles.
- Provide capacity building for community members on developing grant applications. Ensure this support is available to underrepresented groups.
- Ensure that budget and resourcing for long-term maintenance, replacement and other requirements is incorporated into any proposal.
- Support innovative future land and asset uses that are consistent with the supported PMLUs and which can support beneficial use for communities.
- Understand any tax or other liabilities that may be created.
- Partner with other groups such as NGOs, government agencies or local development actors to leverage additional resources and complementary skills.
- Develop a governance transition process to transfer primary responsibility for decision-making away from company or state bodies and towards communitylevel decision-making.
- Develop incentive schemes to encourage high performance staff to stay with the trust.

Alongside its regular fundraising activities, a land trust has a citizens' capacity-building program to provide people with the skills and data required to lobby their government representatives for increased funding for conservation. The trust also provides technical assistance for government executives and lawmakers to enable them to assess different conservation finance options.

Key questions to ask about community benefit land and asset trusts

Are there any specific requirements for a trust to be established and what conditions need to be met?

What is the most appropriate financing mechanism for establishing the trust?

In setting out the governance structure for the trust, which stakeholder groups should be included in the Board of Trustees? What level of seniority should be specified for the groups' representatives on the Board?

How can the company help support the trust without taking on too dominant a role?

The Land Trust, UK

The Land Trust was launched in 2004 as a joint venture between the national-level government agency responsible for regeneration and a conservation organisation. The Trust, which still operates today, was designed as a not-for-profit organisation specialised in long-term sustainable solutions for land management. The Trust's work was initially focused on the restoration of former coal-mining lands and later its scope was extended to include socio-economic objectives. The goal of the Trust is to create environments that people want to live and work in. The Trust manages land in areas of the country with a history of industrial activity, including from mining, utilities, infrastructure, and other sectors.

The Trust is governed by an independently appointed Board of Trustees, which meets 4–6 times a year to discuss key strategic and operational issues. The Board is supported by a Committee structure and Trustee members who report to the Board. Trustee members represent eight different organisations, each with their own expertise on regeneration. These include a national public agency responsible for housing and regeneration, several conservation and

heritage organisations, and a research and advocacy organisation focused on urban planning.

The Trust gets its financing from public sector organisations and trust funds. It works with landowners who, for a variety of reasons, want to pass on responsibility (and often liability) for the management of an area of land. The Trust first secures long-term funding for each site and develops a management plan before taking responsibility for the site's management. At the local level, the Trust identifies a managing partner to manage the site on behalf of the Trust and the local community. The Trust currently has ownership or long-term management responsibility for over 2,000 hectares of land in more than 50 spaces across England.

In one example of the Trust's projects, it provided project management and funding support to a country park adjacent to a closed coal mine to help develop the local tourist industry. A unique feature of the park is 'The Lady of the North', a huge landform sculpture of a reclining woman, constructed from slag-waste, clay and soil.

Further information

The Land Trust. www.thelandtrust.org.uk

Trust for Public Land, USA

The Trust for Public Land is a national non-profit organisation specialised in land conservation and the creation of outdoor public spaces for the benefit of local communities.

The Trust was established in 1972 as a means to link environmental restoration and economic growth. The Trust works with landowners, public agencies and other partners to acquire land and waterways, put these resources into public ownership, and provide access to them by creating parks, trails, schoolyards, etc.

The Trust is supported by donations from landowners, companies and individuals as well as by foundation grants. The Trust is governed by a national Board of

Directors and state-level Advisory Boards. At the local level, the Trust has a network of 80 volunteer 'ambassadors' who are responsible for promoting the organisation, cultivating relationships in the community, connecting the Trust with a broader network of supporters, and providing advice and support to meet the needs of the Trust's local field offices.

The Trust co-creates its land redevelopment plans with community stakeholders, who express their needs and priorities relative to outdoor spaces. As of 2023, the Trust had protected over 1.5 million hectares of land, including former mining lands that have been transformed into recreational sites.

Further information

Trust for Public Land. www.tpl.org

RAG-Stiftung, Germany

From a peak in the 1950s, the long-term phase-out of over 150 years of hard coal mining in the German regions of North Rhine-Westphalia and Saarland was completed in 2018. In order to support the responsible transition process, the foundation RAG-Stiftung was created in June 2007 to take responsibility for financing the perpetual liabilities related to the former mining sites, such as pit water management, polder measures, and groundwater purification.

The foundation was established following a collaborative agreement between Germany's federal government, the coal states of North Rhine-Westphalia and Saarland, the IG BCE trade union, and RAG Aktiengesellschaft (the main mining company operating in the region). The agreement led to a number of mining companies selling their shares to the newly formed foundation for a symbolic price of €1 per share. To date, the foundation is overseen by multistakeholder trustees and executive boards comprising former and current members of the federal, state and local governments, business representatives, and other individuals with relevant mining closure expertise.

The unique model of the foundation is designed to meet the ongoing liabilities from closed mines while reducing the financial burden on government finances. The foundation draws funds for its perpetual obligations and community support initiatives by maintaining a diversified portfolio of investments. This strategy guarantees a consistent flow of revenue through a focus on risk and income diversification. While the foundation's initial assets primarily stemmed from mining activities in the region generated during the peak years of mining, current investments include shares in large real estate and other strategic holdings. Further financial support is also drawn from state and federal governments that back the foundation's mission.

In addition to managing perpetual obligations, the foundation also finances social initiatives in the nearby communities. Community-targeted support initiatives encompass investments in education, science and culture, including training programs for female students in STEM and scientific research in postmining subjects. The foundation also supports cultural projects aimed at the conservation of the region's traditions and history. The implementation of social projects is often carried out in cooperation with community stakeholders such as local museums and universities. For instance, RAG-Stiftung partnered with the Georg Agricola University of Applied Sciences to sponsor research on environmental protection and water management.

Further information

RAG-Stiftung. https://www.rag-stiftung.de/en/

Approach 7: Post-mining joint ventures

Typical level of company involvement

- Convene
- Co-participate
- Finance

What are post-mining joint ventures?

These joint ventures entail formal collaborations between different stakeholder groups for the development of projects to bring post-mining benefits to local communities and wider society. They can involve public-private partnerships or business joint ventures.

How do they work in practice?

As the case studies illustrate, these joint ventures can take many forms. They are normally initiated to either address a problem that affects the different parties involved (as in the case of the Emalahleni water reclamation plant) or to take advantage of an opportunity that requires collaboration between several different organisations (as in the case of the National Bioeconomy Campus on the Lisheen mine site). In either case, it is often the challenging demands of the project, such as its complexity, cost or duration, that makes a joint venture a necessity. The joint ventures are often multi-year partnerships, typically encompassing the identification, planning, and implementation phases of projects.

Joint ventures can involve collaborations between stakeholders such as local, regional or national governments, public sector bodies, mining companies, other businesses, NGOs, and research institutions. The partnerships are generally based on legal agreements that set out the terms of the collaboration.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 3: Partner capability assessment

Tool 5: Collaborative regional post-mining land use suitability assessment

Tool 6: Repurposing assessment

Tool 7: Multistakeholder regional development

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

While joint venture projects are usually developed as post-mining initiatives, the identification and planning process can begin a decade or more ahead of the anticipated closure date. Some are implemented as part of a progressive reclamation of mine site. Ideally, repurposing options will be considered during the planning phase of the mine's lifecycle, to ensure that decisions taken at this early stage (such as where to place an access road) can accommodate potential repurposing opportunities.

What roles can mining companies play?

Mining companies have a central role, and responsibility, to support the repurposing of land and/or assets for sustainable socio-economic transitions. This will entail early and collaborative planning of post-closure options. In terms of the contributions that companies can bring to joint ventures, these may include, for example: (1) identifying appropriate partners and convening the collaboration; (2) co-financing the identification, assessment, development and implementation of the joint initiative; (3) donating land or infrastructure required for the project, or selling these below the market rate; (4) management of the initiative; and (5) developing suitable handover arrangements for post-closure management.

Prerequisites for success

- Willingness by company leadership to adopt a collaborative approach for post-closure initiatives.
- Partner organisations with sufficient resources, capacity and authority.
- Sufficient time to enable the joint venture to be established and to achieve its objectives.
- Consideration of lessons from the history of joint ventures in some contexts (e.g. relating to joint ventures between Indigenous and non-Indigenous businesses).

Potential limitations

- These joint venture projects are typically long-term initiatives that are costly to maintain. It can be very challenging to develop adequate measures to ensure their economic sustainability.
- The long-term management of these post-closure projects is generally not something that mining companies can, or want, to take on. Creative solutions need to be found to transfer this responsibility to another party or to create a new vehicle for future management needs.
- The transfer of responsibility for some assets or pieces of infrastructure can be made complex (and potentially impossible) due to liabilities associated with their management.
- The large scale and complexity of the projects often makes it challenging to maintain the momentum, especially before funding has been secured.
- While it is accepted that the most successful asset transfers occur in advance of mine closure or care and maintenance, mining companies may be reticent to hand over control of an operational asset until after closure has occurred and the functionality of the asset or service is no longer deemed business critical.

What to avoid?

- Avoid postponing discussions on potential repurposing options. The earlier this issue is raised, the more time there will be to consider if and how to establish a joint venture project. This time can also be used to build the capacity of joint venture partners to be ready to take over control of the repurposed asset or service.
- Avoid selecting joint venture partners solely on what they can contribute to the project. Other stakeholder groups, while they may have few resources to contribute, can be important for the credibility and social acceptance of the project.

A regional government attempted unsuccessfully to partner with private sector actors on repurposing initiatives in an area with multiple closed mines. In one case, the mining company, which was winding down its activity, was not interested in sponsoring any repurposing activities and its proposed rehabilitation measures were not compatible with commercially viable options for the site.

Good practice

- Appoint a 'partnership champion' in the company to maintain the energy and communications during the establishment of the joint venture.
- Be open to adjustments that may be required to accommodate the project identified by the joint venture. These may include modifications to closure objectives and completion criteria, closure implementation and monitoring programs, closure cost estimates, etc. Additional stakeholder engagement may also be required.

A joint venture successfully repurposed disused mining infrastructure, earthworks and a tailings heap into a renewable energy hub that includes a solar farm, a hydroelectricity facility and a wind farm. The initiative benefited from strong investment by both the regional government and its commercial partner, a renewable energy company, as well as financial support from the regional infrastructure financing agency, national renewable energy agency and a public sector green energy bank. Construction time and cost were reduced by using the mining pits as the upper and lower reservoirs for the hydro project, and other infrastructure such as the accommodation camp, airstrip and water supply.

Key questions to ask when considering or planning post-mining joint ventures

What experience does the company have with this kind of joint venture? What level of appetite does the company have to enter into these long-term partnerships with a post-closure time horizon?

What organisations or businesses within the company's existing network could be potential joint venture partners?

What options exist for starting a joint venture project while the mine site is still in operation?

Given the expected closure date of the mine, how likely is it that there will be sufficient time to initiate a post-mining joint venture?

Are there opportunities for the company to continue participating in a joint venture after the mine has closed?

If a joint venture is developed, has a strategy been identified for the company which will allow the company to exit over time while leaving the joint venture operational?

SunMine, Canada

Sullivan mine, owned by Teck, was located in the city of Kimberley, Canada. The mine operated 1982–2001. The collaborative closure planning process commenced in 1992, involving more than 30 meetings with community members and stakeholders to assess and offer input on the proposed reclamation plans.

The company convened the Sullivan Public Liaison Committee which included representatives from local government agencies, provincial and federal ministries, the local steelworker's union, the local tribal council, city councillors, members of the public and a local environmental NGO. Teck worked with the committee and others to develop a transition plan to maintain the vitality of the community by repurposing portions of the mine to capitalise on the natural landscape, climate and location. The projects identified and implemented included: (1) the development of ski and golf infrastructure, by the company donating land to the city and financing upgrades to existing leisure facilities; and (2) the expansion of residential housing through a joint venture between the company and a property developer.

A major joint venture project to emerge from the collaborative planning process was the construction

of a 1-megawatt solar panel plant, SunMine. The company partnered with a non-profit solar developer, EcoSmart Foundation, and the municipal council to establish Western Canada's first gridconnected solar facility. At the time it was British Columbia's largest solar project. Development of the solar farm was co-financed by the city and Teck, which each made a US\$2 million investment and Teck donated the land (on reclaimed land within the mine's footprint) and reused legacy mining infrastructure (including a road, electrical grid and sub-station). The Province of BC also contributed US\$1 million. Initially conceived in 2008 by the EcoSmart Foundation, the project began commercial operation in 2015. Originally owned and operated by the City of Kimberley, in 2019 it sold SunMine to Teck, reducing risk for the municipality and allowing expansion.

- EcoSmart Foundation. SunMine. https://www.ecosmartsun.com/sunmine/
- City of Kimberley. SunMine. https://www.kimberley.ca/sunmine
- Teck. SunMine: Seven Things to Know. https://www.teck.com/news/connect/issue/volume-30,-2020/table-of-contents/sunmine-seven-things-to-know

eMalahleni water reclamation plant, South Africa

The city of eMalahleni in South Africa is located close to two active coal mines owned by Thungela (formerly part of Anglo American), and one closed coal mine owned by BHP. About 20 years ago, the city was facing major problems with water availability in this water-stressed area and the high level of water stored in the coal workings was becoming problematic for the mining operations.

There was a clear need for water treatment in order to: (1) address the operational and safety problems related to rising underground mine water; (2) minimise the risks of contaminated mine water being released into the surrounding environment, and (3) ensure the sufficiency of water resources for use by the local community.

In 2002, the two mining companies, then BHP Billiton and Anglo Coal South Africa, partnered to develop the eMalahleni Water Reclamation Plant and to pump excess mine water to this facility where it would be treated to potable water standards. The plant, commissioned in 2007, receives and treats water from the mines and delivers potable water into the regular distribution system of the community.

Early on in the partnership, the companies entered into a formal Joint Initiative Agreement to clearly define their mandates, team composition, communication and information-sharing protocols, and cost-sharing arrangements.

Work by the Joint Initiative Steering Committee showed that there is potential to expand it by bringing in other mines in the area with similar water management challenges.

One of the challenges facing this initiative is its sustainability. The treated water sold to the community is heavily subsidised by the companies and it is unclear what will happen once the operating mines reach closure. The Joint Initiative Steering Committee has initiated an evaluation of a number of business models for the long-term management of the water treatment plant and other future projects.

Further information

 UNFCCC. 2012. eMalahleni Water Reclamation Plant. https://unfccc.int/climate-action/ momentum-for-change/lighthouse-activities/ emalahleni-water-reclamation-plant

Daybreak, USA

Daybreak is a large master-planned community in Utah, USA. The community is located on one section of the Bingham Canyon Mine property. The mine has been operated by Kennecott Utah Copper (a subsidiary of Rio Tinto) since 1989. By the early 2000s, certain areas of the mine's surrounding land were earmarked for repurposing. A multi-year, multistakeholder engagement process was initiated to address the legacy of mining and meet community needs. The company was responsible for environmental remediation, community relations and coordination with regulatory bodies. The local government negotiated land-use agreements, integrated the project into municipal infrastructure plans, and ensured regulatory compliance. Environmental and regulatory agencies ensured that the land was remediated to safe standards for residential and commercial use. Input from the community and civil society groups helped to shape

the development and ensure that concerns about health, safety, and quality of life were addressed.

The engagement process culminated in the opening of the Daybreak Community in 2004. The project repurposed over 1,500 hectares of former mining land into a residential area with capacity for 20,000 homes and an emphasis on green spaces, sustainable design and social cohesion. As of 2022, the town's population was approximately 44,000.

In 2016, the company sold its land and associated assets in the Daybreak Community to an investment firm, but remains responsible for financing the site's environmental remediation including the treatment of contaminated groundwater.

Further information

Daybreak. 2019. Daybreak's Environmental History.
 https://www.daybreakutah.com/wp-content/
 uploads/Daybreak-Environmental-History-2019.pdf

National Bioeconomy Campus, Ireland

Lisheen mine, owned by Vedanta Resources, operated 1999–2015. In 2014, the Irish Government appointed a Task Force to identify alternative uses of the site. The Task Force comprised representatives of local government, industrial development agencies and the mining company. The Task Force recommended the site be redeveloped as a national bioeconomy campus, with the aim of fostering innovation and creating significant employment opportunities in the bioeconomy.

The transition of this site required considerable investment by both Vedanta and the Irish Government. The company was responsible for ensuring the safety and stability of the site, to create a space that would be attractive to other industries. A US\$30 million investment by the Irish Government launched the National Bioeconomy Campus and a

Bioeconomy Research Centre at the site, and an additional US\$5 million in government aid has enabled the conversion of one of the mine's buildings into a bioeconomy pilot plant. This will enable industry, entrepreneurs and researchers to scale technologies that convert natural resources to high-value products in a wide variety of sectors including food and feed ingredients, pharmaceuticals, natural chemicals and biodegradable plastics.

Further information

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 https://bioeconomyfoundation.com/
- Wheston, S. 2018. Repurposing the Lisheen Mine Site to develop Ireland's National Bioeconomy Campus. Presentation. https://greenbusiness.ie/wp-content/uploads/2018/11/06-Repurposing_the_Lisheen_Mine_Site_17-10-18.pdf

Sanford Underground Research Facility, USA

The Sanford Underground Research Facility (SURF) deep underground research laboratory is located near the town of Lead, in the Black Hills of South Dakota. The facility was developed 4,850 feet deep within the former Homestake gold mine, which operated 1876–2001. The success of the scientific programs at SURF and the partnerships with local communities demonstrate the potential for creative and sitespecific approaches to mine repurposing.

The depth and stable rock of the Homestake mine meant that pioneering solar neutrino experimental research was originally conducted in the 1960s while the mine was still operating. With the closure of the mine, there was interest from the scientists involved in converting it into a dedicated deep underground physics research laboratory.

A particular challenge was the lengthy negotiations for the Property Donation Agreement (PDA) between Barrick and the state, which took over five years, and were complicated by concerns about legal liability, funding, government approvals, and safety and environmental practices. This became particularly acute when increasing maintenance costs required Barrick to stop the dewatering of the mine, threatening the viability of developing the facility. The mine was eventually donated to the state in 2006 by Barrick and SURF opened in 2009.

SURF is managed by the South Dakota Science and

Technology Authority (SDSTA). SURF hosts numerous scientific experiments, including studies on dark matter, neutrinos and axions. Collaborative efforts involve researchers from over 80 national and international research institutions. Many of the current SURF staff previously worked in the Homestake mine.

SURF continues to expand. The Deep Underground Neutrino Experiment (DUNE), the largest underground neutrino experiment in the world, is currently being developed and expected to generate US\$950 million for South Dakota's economy and create nearly 2,000 jobs during peak construction.

Collaboration with Native American tribes is a crucial aspect of SURF's transformation. The Black Hills are sacred to the Lakota and other tribal groups, and the SDSTA has worked closely with nine local tribes to ensure the project's cultural sensitivity. A Cultural Advisory Committee, made up of tribal leaders, provides guidance, and the facility offers benefits such as jobs and internships for Native Americans. While there were initial concerns about the disturbance of sacred land, SURF has focused on fostering positive relationships through education and respect.

- Sanford Underground Research Facility.
 www.sanfordlab.org
- Lesko, K.T. 2015. 'The Sanford Underground Research Facility at Homestake (SURF)'.
 Physics Procedia 61, pp. 542–51.

Agua para Cajamarca program, Peru

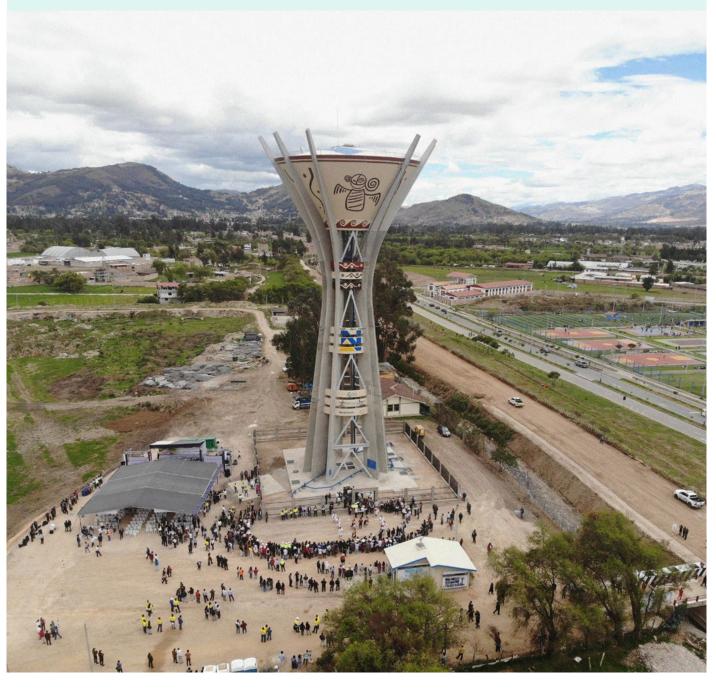
The 'Agua para Cajamarca' ('Water for Cajamarca') program is a public-private partnership that was launched in 2012 to address the region's water challenges through a collaborative approach. The program aims to close the current domestic water gap and ensure long-term water availability. Since 2022 the emphasis has been on physical and natural infrastructure. Physical infrastructure includes 4 water wells and tank systems together with reservoirs. Natural infrastructure has been enhanced in conjunction with communities, universities and civil society, namely through Huella Verde (Green Footprint), an afforestation project that focuses on afforesting rural areas with forestry potential to enhance community development. Local community initiatives for biodiversity conservation and recovery,

as well as sustainable management of ecosystem services are also being promoted with international cooperation.

Newmont has played a leading role in the design of engineering solutions, fostering collaboration and effective articulation between the national, regional, and local governments to ensure successful implementation of these projects. The infrastructure initiative has been developed under a shared funding model, enabling financial contributions from multiple stakeholders.

Further information

Newmont Yanacocha. Agua para Cajamarca: the challenge that unites us. https://www.losandes.org.
 pe/wp-content/uploads/2023/03/
 AguaparacajamarcaENG.pdf



Regeneration Enterprises, Canada

In 2021, Rio Tinto partnered with RESOLVE, a nonprofit organisation, to launch Regeneration Enterprises, a social enterprise company that uses the remining and processing of waste from closed mine sites to support rehabilitation activities and restore natural environments. Rio Tinto's participation was established through a memorandum of understanding with RESOLVE and involved an equity investment of US\$2 million in Regeneration Enterprises. Through this initiative, metals are extracted from mine tailings, waste rock and water, and then sold to fund the restoration of habitats and closure activities. Regeneration Enterprises targets legacy and former mine sites, whether they are still owned by companies or have been abandoned. The company works through innovative partnerships and multistakeholder engagement.

The flagship project of the company is the Salmon Gold program to remine historical placer gold mine sites and restore fish habitat using sustainable techniques. Regeneration Enterprise activities typically span several years, as they involve both initial extraction activities and long-term ecological monitoring and maintenance.

The projects involve key stakeholders including: (1) mining companies like Rio Tinto and smaller placer mining operations, which participate in the remining and restoration, and/or contribute funding and access to innovative technologies; (2) Indigenous organisations, which bring Traditional Knowledge, help set priorities for land restoration and engage in performance monitoring of the projects; (3) NGOs and experts, who collaborate to test, support and scale technologies for remining, reprocessing and restoration, and others who provide specialist expertise in law, policy, finance and other areas; (4) commercial partners such as other mining companies (Newmont and Donlin), the gold refinery (MKS PAMP) that processes the gold and Apple as a downstream customer integrating Salmon Gold into its supply chain.

One challenge for Regeneration Enterprises is that in small-scale placer mining, the revenue from gold remining is usually insufficient to cover the cost of restoration. Other sources of revenue are being explored in order to fill this gap.

Further information

Regeneration Enterprises.
 https://www.regeneration.enterprises/

Approach 8: Economic development investment vehicles

Typical level of company involvement

- Convene
- Co-participate
- Finance

What are economic development investment vehicles?

Economic development investment vehicles are formal institutional mechanisms created to deliver funding at scale for socio-economic development. These mechanisms may be public sector initiatives, public-private partnerships or collaborations between several companies. The vehicles are designed as long-term mechanisms to cover a broad geographic area (regional or national), such as mining areas, former mining areas, or labour-sending areas. They are generally designed to address specific focal areas and well-defined beneficiary groups.

How do they work in practice?

A wide variety of models have been developed. In general, economic development investment vehicles comprise a funding mechanism, to ensure they are adequately resourced, and an operating mechanism for financing, planning and implementing the projects they support.

In the case of government-run investment vehicles, funding comes from public funds and can take the form of upfront endowments and/or annual allocations. In the case of collaborations involving non-government parties, funding is generally provided by each of the participating bodies. These vehicles may also seek to raise additional funds from other sources, such as charitable foundations, government programs or development agencies.

The operating mechanisms of these vehicles generally follow standard project-based models. The vehicles employ core teams to identify and plan projects, in consultation with local communities, and to manage their implementation. In some cases, the actual delivery of the projects may be outsourced to other organisations.

These vehicles are established as legal entities with formal institutional frameworks. They may exist as public corporations, government agencies, or coalitions of non-governmental and/or business actors. Agreements signed by the partners define their individual responsibilities and the collaboration mechanisms.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 3: Partner capability assessment

Tool 5: Collaborative regional post-mining land use suitability assessment

Tool 6: Repurposing assessment

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

Economic development investment vehicles, as described here, function in areas with proposed, active or closed mines. Their goal, to stimulate economic development, is served by intervening well in advance of mine closures, to allow sufficient time to achieve economic diversification, including the establishment of alternative sources of employment and new economic drivers.

What roles can mining companies play?

While private-sector mining companies may have little or no role in government-run investment vehicles, they can play critical roles in vehicles that operate as public-private partnerships or collaborations with other companies. This is evidenced, for example, in the Impact Catalyst in South Africa. In these cases, companies may take the initiative to convene partner organisations to establish the vehicle and may engage with the government to encourage and explore partnership mechanisms. As stipulated in the formal agreements signed with other parties in these vehicles, companies provide co-financing to cover the operational costs of the vehicles, and the additional costs associated with each project.

Prerequisites for success

- A steady and predictable funding stream for the vehicle.
- Succession planning among directors.
- Long-term management of funds, taking into account when revenue streams change.
- Transparency regarding fund allocation.
- Consideration of tax implications.
- If company-funded, early investment of funds in an interest-bearing investment vehicle to support the generation of sufficient interest to pay for operational expenses when needed.
- Adequate capacity among the participating organisations.
- Willingness of the parties to go beyond their immediate areas of focus.
- Ability of the different parties to unite around a common goal.

Potential limitations

- The institutional coordination requirements of these vehicles can be administratively complex and lead to delays in their operations.
- In the case of coalition-based vehicles, the participating organisations may find it difficult to work together effectively, given their different mandates/missions, priorities, timelines and institutional cultures.
- Vehicles funded on a rolling basis can be challenging to manage, and the potential for funding to vary from one funding cycle to the next can make it difficult to plan longer-term projects.

What to avoid?

- Avoid yielding to external pressure to show strong early results. Take on a limited number of projects until the vehicle's collaborating and operating mechanisms have proven effective and efficient.
- In the case of coalition-based vehicles, avoid focusing solely on projects that are 'the usual fare' for the participating organisation(s). Look for opportunities to leverage synergies between their different areas of focus by, for example, creating integrated multisectoral development opportunities for maximum impact.

A public sector investment vehicle responsible for financing post-mining mine rehabilitation suffered from a weak profit margin due to persistent losses from investments in other areas of its business. This left the rehabilitation work heavily dependent on annual subsidies from the government to mitigate the vehicle's losses.

Good practice

- Pilot a small number of initiatives in the early stages of the vehicle (and any partnerships that might be involved) before building up to a fuller program.
- Spend time upfront with any collaborating organisations to develop an overall Theory of Change for the vehicle and to discuss how this relates to the aims and objectives of each organisation.
- Be transparent about the criteria used to identify projects to fund and consult widely with local communities in this process.
- Establish formal mechanisms to regularly review the overall performance of the vehicle and the impacts of each project funded.

A public sector enterprise, which represents six municipalities bordering a vast lignite mine, partnered with the mining company to create a 'project company' to invest in renewable energy in the area around the mine. The investments will include the expansion of the 45 hectares of grid-connected solar parks already operating at the mine. The municipalities and the mining company have developed a framework agreement on their plans for the mine site, which is due to close by 2030, and solar energy projects will be a key part of the area's development. The municipalities hold 49% of the shares in the existing solar farms and have the option to acquire 49% of the shares in all future renewable energy projects at the mine.

Key questions to ask when considering or planning economic development investment vehicles

What is the appetite within the company for creating or participating in such a vehicle?

How would such a vehicle enable the company to better deliver on its social impact and economic development objectives?

Are there existing vehicles that could achieve this goal?

What is the long-term strategy for management of the vehicle beyond mine income streams?

What administrative costs are associated with managing the vehicle?

How would the company ensure broad alignment between the investments made by the vehicle and the company's own social investment projects?

Oranjemund Town Transform Agency, Namibia

Oranjemund is a planned company town located in a major gem-diamond-producing region in Namibia. In 2019, the mining company, Namdeb, co-owned by the Namibian government and De Beers Group, created a town transform agency.

At the time, the Oranjemund diamond mine was projected to cease operations in 2022, although the life of the mine has since been extended by up to two decades. The agency, known as OMDis, is a Special Purpose Vehicle, the sole purpose of which is to accelerate the economic diversification of Oranjemund to ensure the town's sustainability by 2030 and beyond. The agency is 100% funded by Namdeb and is made up of a team of experts in economic development, business support and investment facilitation. By 2030, the agency aims to establish 50 small and medium-sized enterprises (SMEs) and help establish a stable town population of at least 15,000, with the creation of at least two new industries.

The agency collaborates closely with other stakeholder groups to guarantee the successful planning and implementation of town transition

initiatives. This includes the mining company, the Oranjemund town council and an independent community association, OMD 2030, which was created to represent the inhabitants of Oranjemund as key transformation stakeholders. OMD 2030 is co-accountable for the social aspects of the Town Transform program delivery and its annual implementation plans are created in partnership with OMDis, Namdeb and the town council.

The overall vision is to transform Oranjemund from a once privately owned, closed and isolated town into a growing community with a diversified economic base that takes advantage of all its natural resources, including for agriculture and tourism development.

- Oranjemund Town Transform Agency. https://www.omdis.co/
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 Bloemfontein. https://scholar.ufs.ac.za/server/api/core/bitstreams/d9615375-403c-4364-a6ce-b8406e589600/content

LMBV, Germany

After the reunification of Germany in 1990, the German Government established the state-owned company Lausitzer und Mitteldeutsche Bergbau und Verwaltungsgesellschaft (LMBV) to manage the rehabilitation of closed mine sites in the former German Democratic Republic. LMBV is a federally owned limited liability company, with the sole shareholder being the Federal Republic of Germany, represented by the Federal Ministry of Finance.

LMBV is responsible for the rehabilitation of former lignite, potash, salt and ore mines. These areas cover a total of more than 1,000km². The specific responsibilities of LMBV include: (1) restoring the land to a planned reuse; (2) eliminating hazards for people and the environment; (3) reintegrating the mined land into the surrounding environment; and (4) implementing land-use measures that will support economic recovery of the former mining regions in the public interest. To date, LMBV has rehabilitated 50,000 hectares of land.

LMBV's mine reclamation plans need to be approved by the four state authorities where most of the closed mines are located. Prior to this, the reclamation plans go through a series of public hearings in the affected areas. The Federal Government and the four states share the costs for mine reclamation. These public funds are allocated every five years, based on consecutive public administrative agreements. Activities that go beyond mine reclamation (e.g. the development of infrastructure such as harbour facilities, recreational beaches and bicycle paths) are financed in full by the relevant state.

Though LMBV is the project management organisation and is legally responsible for mine reclamation, it is not the entity that carries out the actual work projects. Instead, the LMBV uses a tendering process to award work to contractors. The same also applies to the scientific and expert appraisals commissioned by LMBV. This contracting approach has successfully created a market for the rehabilitation of mining areas as well as enabling long-term capacity building and encouraging the development of innovative technologies.

Further information

LMBV. 2023. Mine rehabilitation in Germany.
 https://www.lmbv.de/wp-content/uploads/2023/08/Mine-rehabilitation-in-Germany-Example-LMBV.pdf

Korea Mine Rehabilitation and Mineral Resources Corporation (KOMIR), Korea

In 2021, the South Korean government launched a new public agency to oversee metals, minerals and mining affairs. The new entity, Korea Mine Rehabilitation and Mineral Resources Corporation (KOMIR) was formed from the merging of two existing bodies that were separately responsible for:

(1) overseeing the stable supply of domestic mineral resources; and (2) addressing mine rehabilitation and local economic development in former mining areas. KOMIR has taken on all these responsibilities.

KOMIR is funded through annual allocations from the government and through its ability to secure private

investment. KOMIR acts as a specialised support agency for areas where mines have closed. To fulfil its role to foster revitalisation of former mining areas, KOMIR provides loans for projects that support economic diversification and provides financial and business support for local small and medium-sized enterprises (SMEs), as well as promoting clean energy projects.

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Impact Catalyst, South Africa

The Impact Catalyst is an initiative founded in 2019 by Anglo American, the Council of Scientific and Industrial Research (CSIR, a public research institution), Exxaro, and World Vision South Africa (a development NGO). The purpose of the initiative is to create mechanisms that drive large-scale, socio-economic development initiatives through public-private partnerships.

The Impact Catalyst was first launched in Limpopo Province and has subsequently expanded to Mpumalanga and the Northern Cape. Joint programs are established between the Impact Catalyst and the Office of the Premier in the selected provinces through a coordination mechanism, the 'Collaborative Regional Development Platform', via which shared programs are implemented. The focus of these

programs is on improving the health, wellbeing and living conditions of communities in mining areas.

Leveraging the expertise, skills, networks and resources of each partner, the aim is to institutionalise long-term collaboration for collective impact on socio-economic development.

The Impact Catalyst draws on a variety of funding streams, including seed funding, project-specific funds, and grants. Its team members have expertise in strategic planning and ideation, project management, communications and marketing. Where needed, experts and implementation partners are brought in to support the delivery of projects.

Further information

The Impact Catalyst. https://www.impactcatalyst.co.za/

Bokamoso Ba Rona Agri-Industrial Program, South Africa

Launched in 2018, the Bokamoso Ba Rona agriindustrial program in the West Rand of Gauteng, South Africa, is a multistakeholder effort aimed at transforming the region's mining legacy into a sustainable and economically inclusive future beyond mining.

The Bokamoso Ba Rona (Sesotho for 'Our Future') initiative seeks to create an agri-industrial economic cluster by supporting the development of agroindustrial businesses across 30,000 hectares of unused mine owned land. The partner companies are providing access to land and infrastructure including the construction of training facilities to support the skills requirements of the economic cluster. The economic programs which are parallel to the mining economy that is the anchor in the region, focus on job creation, enterprise development and community empowerment in order to support economic diversification in response to the declining gold production in the area. Early-stage initiatives include pilot programs in agriculture, solar energy, land rehabilitation, and community development.

The project was formally initiated in 2018 with a Memorandum of Understanding (MoU) between seven key partners, including the mining company Sibanye-Stillwater, the Far West Rand Dolomitic Water Association (FWRDWA), the West Rand Development Agency (WRDA), and the Gauteng Infrastructure Financing Agency (GIFA).

A land non-profit company has been established to partner with investors and communities to unlock the potential of the land and unused infrastructure for economic benefit. The transition from mining to alternative economic programmes requires community engagement as a vital input to the success of the program, with leaders committed to addressing local needs and ensuring that surrounding communities benefit from the developments.

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Approach 9: Monitoring committees

Typical level of company involvement

- Convene
- Co-participate
- Build capacity
- Finance

What are monitoring committees?

As used here, monitoring committees are multistakeholder bodies mandated to review the socio-economic and/or environmental performance of mining operations. The committees often have additional responsibilities to provide feedback and recommendations on any mitigation measures required and to inform local stakeholders about the results of their activities.

How do they work in practice?

Monitoring committees are generally formal entities with defined governance and membership structures, powers and responsibilities, and financing. They normally operate at the level of individual mine sites and are usually initiated by the companies involved. A typical composition may include representatives of the mining company, local communities, community organisations and/or Indigenous Peoples organisations, local research institutions, and local or regional government authorities.

In many cases, the committees have been set up as part of formal agreements signed between the mining companies and local stakeholders, covering the socioeconomic and/or environmental commitments of the different parties. In such cases, the purpose of the committee is to track the extent to which the company is implementing the actions and achieving the outcomes foreseen in the agreement. The committee is then responsible for recommending any necessary corrective actions on the part of the company and reviewing progress on these actions.

Monitoring committees generally meet every three or four months to review and discuss progress reports, the results of monitoring activities, and other input. Decisions are usually based on consensus for issues such as the prioritisation of issues to address and the formulation of recommendations.

Independent support may be provided to the committees by NGOs or consulting firms, for example, to facilitate the meeting discussions or to provide data and analysis on particular issues.

What tools may be useful?

Tool 1: Multistakeholder readiness assessment

Tool 2: Stakeholder network mapping

Tool 9: Participatory monitoring committees

Tool 11: Transition outcome indicators

Where do they fit in the mining lifecycle?

Wherever possible, a monitoring committee is best established prior to the opening of the mine to enable the committee to help build a collaborative and adaptive approach to the management of socio-economic and/ or environmental issues. However, these committees can be valuable even if not established until near the end of the life of the mine.

What roles can mining companies play?

Mining companies are usually the initiators of these committees, convening the different parties and proposing a multistakeholder approach to the monitoring work. Companies generally provide financial resources for the committee's work, including the costs associated with the regular meetings, sampling and data/laboratory analysis (as applicable), the commissioning of independent studies, and the communication activities of the committee. Company representatives take part in the committee alongside the other members. In some cases, companies may provide capacity building to local stakeholder representatives on the committee (e.g. to enhance their understanding of technical issues or their ability to interpret monitoring data).

Prerequisites for success

- A certain level of trust among local communities/ Indigenous groups on the intended purpose of the committee.
- A certain level of social cohesion with local communities/Indigenous groups, for their representatives on the committee to be seen as credible spokespeople and for information to flow from the committee to broader society.
- Clear metrics and regularly collected monitoring data for the committee to review.
- A mechanism for the committee to propose recommendations to the mining company for the mining company to respond to these.

Potential limitations

- Given the time and effort required of committee members and the long-term nature of the committee, turnover of local stakeholder members can be high, which makes relationship-building and capacity-building challenging.
- Financing from the company can generate suspicion within local communities.
- Baseline conditions are often not measured, particularly for some socio-economic variables, making it very difficult to measure changes against a 'without-mining' scenario.
- A single monitoring committee in an area with multiple mines will find it challenging to consider the cumulative effects of these different operations.

What to avoid?

— When selecting which stakeholder groups should be represented on the committee, avoid reproducing the usual patterns of exclusion. Wherever possible, encourage the inclusion of representatives of different groups within local communities including those (such as youth, women and the elderly) who are often underrepresented. Avoid these committees taking on broader agendas without formal changes to their mandates. It may be necessary to establish other multistakeholder groups for other purposes, such as closure planning.

An initiative to establish a multistakeholder monitoring committee began long after the area's mines had closed. This made it much more difficult to re-engage with local stakeholders to encourage their participation in the committee. And in the interim period, much of the adverse socio-economic and environmental impacts from the mines had already taken place, without any active monitoring.

Good practice

- Ensure that the composition of the committee adequately includes historically underrepresented groups such as women, youth, Indigenous Peoples and other marginalised groups.
- Ensure that the monitoring metrics include gendersensitive indicators and measures of inclusivity (e.g. tracking the impacts on women and vulnerable groups) and ensure the committee reviews these specific data points when making recommendations.
- Full transparency on the company's response to the committee's recommendations, publishing what actions have been taken and the reasons for any recommendations not being accepted or acted on.
- Investment in professional and independent facilitation for the committee meetings.
- Establishment of local community-based monitoring programs to enhance community ownership and trust in the results of the monitoring, and to provide additional input for the committee.

A dedicated website was created for a monitoring committee to provide publicly accessible information on its activities and the results of its work.

Key questions to ask when considering or planning monitoring committees

Is there an agreement in place that requires a committee to be established? If so, what are the specific requirements?

When would be the earliest possible time for the establishment of a monitoring committee?

What stakeholder groups should be represented on the committee? How can different community interests be represented?

What kinds of capacity-building activities may be required to ensure all committee members can fully participate in the discussions and decision-making? What specific capacity-building initiatives may be necessary to enable women, youth, and marginalised groups to engage meaningfully in committee discussions and decision-making?

What kind of financing would be required to cover the direct costs of the committee? What additional financing may be needed, such as a budget for corrective actions identified as being required via the monitoring process?

What level of company representation would be most appropriate?

Uranium City monitoring, Canada

The Athabasca Basin in Saskatchewan, Canada, has dozens of abandoned uranium mines, following closure of the mining operations in the 1980s. Most of the population of the area's main economic hub, Uranium City, left once the mines closed and social infrastructure such as the school and hospital were no longer available. Today fewer than 100 people remain in Uranium City.

In 2016, the city and First Nations groups within the Basin signed an agreement with two mining companies, Cameco and Orano, which still have operating uranium mines in the area. The Ya'Thi Néné Collaboration Agreement focuses on five pillars: (1) workforce development, (2) business development, (3) community engagement, (4) environmental stewardship, and (5) community investment.

A multistakeholder Joint Implementation Committee was formed, comprised of representatives from the First Nation and municipal communities along with Ya'thi Néné, Cameco and Orano to ensure the agreement is implemented successfully and the commitments upheld.

The committee monitors and reports on targets and metrics, against the objectives set for the Agreement. The committee meets four times a year to discuss how implementation is progressing, what is working, and where challenges exist. Five-yearly reports are produced on the results of this work.

The Committee's work is supported by a Business Advisory Committee, which monitors the efforts the mining companies are taking to honour the commitment in the Agreement to prioritise locally based businesses. The Athabasca Joint Engagement and Environment Sub-committee is responsible for reviewing information from the community-based environmental monitoring program. Through this monitoring program, community members are actively involved in identifying locations and gathering samples of water, plants and fish, which are then analysed in an independent laboratory.

Further information

— Cameco and Orano. Ya'thi Néné Collaboration Agreement: 2022 Progress Report. https://cdn.orano.group/canada/docs/librariesprovider13/canada/resources/collaboration-agreement-reports/yathinene_ca_report_web_2023.pdf?sfvrsn=f77be9d5_5

Woodcutters Liaison Committee, Australia

The Woodcutters mine, in Northern Territory, Australia, is a non-operational lead and zinc mine that closed in 1999 and was acquired by Newmont in 2002. In 1995, the then-involved mining companies negotiated the Woodcutters Mine Agreement with the Northern Land Council (a regional statutory authority responsible for defending First Nations peoples' land rights) and a traditional owner land trust, the Finniss River Land Trust. The agreement mandated collaboration with First Nations groups during mine closure, including local employment and training commitments. Through the agreement, the Woodcutters Liaison Committee was established, to be responsible for identifying and agreeing on PMLUs. The committee reviewed progress on the commitments set out in the agreement, resolved disputes, and communicated with clan members on issues associated with site ownership transfer. A consulting company, focused on First Nations issues, supported the committee by

developing its governance protocols and facilitating meeting discussions.

The committee, which still operates, comprises representatives of each traditional owner group, the land council and the mining company. The committee meets up to three times a year to discuss site updates, rehabilitation, safety, and employment opportunities.

Further information

- Newmont. 2014. Indigenous Consulting Group to help clear pathway to hand over Woodcutters. https://www.newmont.com/investors/news-release/news-details/2014/Indigenous-Consulting-Group-to-help-clear-pathway-to-hand-over-Woodcutters/default.aspx
- Agreements, Treaties and Negotiated Settlements
 Project. 1995. Woodcutters Mine Agreement.
 https://database.atns.net.au/agreement.
 asp?EntityID=1395

Traditional Knowledge Monitoring at Diavik, Canada

An example of incorporating traditional knowledge from local communities in Diavik's environmental monitoring programs is the Aquatic Effects Monitoring Program (AEMP). The AEMP uses methods of data collection from western science as well as observation-based data from Traditional Knowledge (TK) holders to evaluate fish health and water quality close to the mine site. Fish are caught, cleaned, inspected, cooked, and tasted. Water is inspected, sampled, boiled, and tasted. Participants share traditional knowledge of the Lac de Gras area and record their observations of the fish and the water.

An important part of monitoring involves establishing criteria for evaluating the quality of what is being monitored. This is commonly done from a westernscience perspective. As part of the requirements for the Processed Kimberlite to Mine Workings (PKMW) project, Diavik worked with Indigenous partners to

develop cultural use water quality criteria that ensure water is healthy and safe not only from a western science perspective, but also from a Traditional and cultural-use perspective. The criteria were initially developed from input from the TK Panel. Additional workshops with Indigenous groups validated and expanded on the criteria. This is the first time that cultural use criteria have been incorporated into a Water License. Diavik is currently working with Indigenous groups on the development of a TK Monitoring program as part of the Final Closure and Reclamation plan. This work is considering building on the application of the cultural water use criteria to other aspects of mine closure areas of the mine site.

Further information

Environmental Monitoring Advisory Board. 2019.
 Our Youth, Our Future: Watching Fish and Water near the Diavik Diamond Mine. https://www.emab.ca/news/our-youth-our-future-watching-fish-and-water-near-diavik-diamond-mine

Tools to support multistakeholder approaches



Table 9 summarises 11 tools that may be useful in applications of multistakeholder approaches to socio-economic transition. This section provides short profiles of these tools and points to other resources that can be accessed to learn more about the use of these tools.

Table 9. Tools to support multistakeholder approaches

Tool		Description
1	Multistakeholder readiness assessment	A simple self-assessment tool to consider how well prepared the company or other stakeholders are for engagement in multistakeholder processes.
2	Stakeholder network mapping	A tool for mapping stakeholder networks, i.e. relationships between stakeholders.
3	Partner capability assessment	A tool for assessing the capabilities of potential partners prior to collaborating with them in multistakeholder approaches.
4	Community scenario planning and visioning	A tool to develop a long-term community- or region-level vision for the desired outcome of socio-economic transitions.
5	Collaborative regional post-mining land use suitability assessment	A tool to identify and assess the options available for different post-closure land uses.
6	Repurposing assessment	A tool to assess the potential for repurposing of mine land and/or assets.
7	Multistakeholder regional development	A tool, or model, of collaborative regional development.
8	Town Transition Tool	A tool for structuring community-level discussions on socio-economic transitions related to mine closure.
9	Participatory monitoring committees	A tool for establishing and running local level multistakeholder bodies charged with monitoring the process and/or outcomes of socio-economic transitions.
10	Regional skills transition planning	A tool for identifying the needs and opportunities for skills development in the context of redundancies associated with socio-economic transitions.
11	Transition outcome indicators	A tool in the form of a framework of potential indicators that can be used in planning, implementing and monitoring initiatives related to socio-economic transitions.

Multistakeholder	Tool 1:	Tool 2:	Tool 3:	Tool 4:	Tool 5:	Tool 6:	Tool 7:	Tool 8:	Tool 9:	Tool 10:	Tool 11:
approach	Multistakeholder readiness assessment	Stakeholder network mapping	Partner capability assessment	Community scenario planning and visioning	Collaborative regional post-mining land use suitability assessment	Repurposing assessment	Multistakeholder regional development	Town Transition Tool	Participatory monitoring committees	Regional skills transition planning	Transition outcome indicators
Mine closure consultative groups	•	•		•				•			•
Collaborative regional planning processes	•	•			•	•	•			•	•
Community-level transition initiatives	•	•		•				•			•
Regeneration/ development coalitions	•	•	•		•	•	•				•
Social investment transition foundations, trusts and funds	•	•			•	•					•
Land and asset trusts	•	•			•	•					•
Post-mining joint ventures	•	•	•		•	•	•				•
Economic development investment vehicles	•	•			•	•					•
Monitoring committees	•	•							•		•

Tool 1: Multistakeholder readiness assessment

Drawn in part from the ICMM Community Development Toolkit,¹¹ the multistakeholder readiness assessment tool offers a resource for mining companies to understand what stakeholder characteristics and contextual factors may affect the likelihood and success of multistakeholder cooperation. A strong baseline knowledge of these elements is essential for companies to identify any capacity gaps that need to be

addressed, and to recognise opportunities for improving contextual factors to strengthen the enabling environment for collaboration.

The tool provides companies with a list of key questions on stakeholder characteristics and readiness (including the readiness of the mining company itself), which can be used by company representatives as an assessment and self-assessment exercise.

Stakeholder	Enabling factors	Key questions
Company	 Engagement and capacity building resources and capability Willingness to participate Willingness to cede control to others 	 Does the company's leadership team have a good understanding of a partnership approach and are they supportive of any ongoing partnering activities? Are there processes in place to identify work areas, challenges and opportunities that would benefit from a partnership approach? Does the company have experience of coordinating multistakeholder engagement for mine closure or other similar processes? Has the company made available the financial and human resources needed to meaningfully engage relevant stakeholders in planning, implementing and monitoring projects related to mine closure? Are there tools and clear guidance available to company staff to support the development of partnerships? Has the company made available the financial and human resources needed to conduct capacity building for other stakeholders in order to facilitate and enable a participatory closure process? Is the company willing to cede control of socio-economic transition-related processes to other stakeholders? Are there systems in place to ensure partnerships can continue when a key company representative departs? Does the company possess adequate knowledge of the local context relating to socio-economic transition? Is the company an active part of a diverse and active network of stakeholders including communities, local government, NGOs and other companies?
Community	 Engagement capacity Willingness to participate Strong knowledge of mine closure information 	 Do community stakeholders have the capacity to meaningfully engage and cooperate with other stakeholders to plan, implement and monitor projects related to mine closure? Are community members interested in engaging with other stakeholders to plan, implement and monitor projects related to mine closure? Do community stakeholders have sufficient knowledge and understanding of mine closure both generally and regarding the relevant process they are involved in?

Government	 Strong institutional capability Willingness to participate and coordinate Strong regulatory environment and enforcement power 	 Do relevant government bodies have the institutional capability to participate and/or coordinate multistakeholder processes? Do relevant government bodies have experience of coordinating multistakeholder processes? Do relevant government bodies have access to regulatory instruments that provide a framework for stakeholder engagement related to mine closure? Do relevant government bodies have the capacity to enforce any existing regulatory environment around mine closure? Do relevant government bodies already have in place regional and local plans for socio-economic transition during mine closure or similar decommissioning processes?
Workers	Strong representation channels Willingness to participate and receive support	 Do workers have adequate systems of representation to express their preferences and needs regarding mine closure? Are workers willing to engage with all relevant stakeholders to plan, implement and monitor projects related to mine closure? Are workers able to receive support from other stakeholders on all aspects of mine closure, especially on socio-economic transition after mine closure?

Contextual factors are also key elements determining the likelihood of a successful multistakeholder approach to mine closure. To determine multistakeholder readiness, companies should ask themselves if the required contextual factors conducive to successful stakeholder engagement exist.

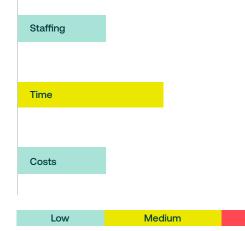
Contextual factor	Key questions
Cooperation and trust	Are there existing multistakeholder collaboration forums or similar processes/bodies? Is there a relationship of trust between stakeholders with converging interests and priorities?
Financial resources	Are there adequate government and/or private funds to support socio-economic transition planning and implementation of transition initiatives?
Existing legacies	Are there any major negative legacies from the mining activities (e.g. environmental and health impacts, human rights abuses or conflict) that could jeopardise the establishment of multistakeholder processes?

Requirements for mining companies

Staffing requirements for this tool are low, with only a small number of company representatives required to conduct the assessment.

Time requirements for this tool are moderate, with moderate time required for gathering the relevant information to engage the tool.

> Cost requirements are low for the tool, with the assessment not requiring targeted funds to be used.



Applicability

The multistakeholder readiness assessment tool can be used for all multistakeholder approaches related to socio-economic transition, by helping to assess the feasibility of initiating these approaches and to facilitate the planning of measures to improve stakeholder readiness and enabling conditions.

Additional resources

ICMM. 2012. Community Development Toolkit:

A set of 20 revised and updated tools intended for use throughout the mining project cycle. London: ICMM. pp. 45–73. https://www.icmm.com/website/publications/ pdfs/social-performance/2012/guidance_community-development-toolkit.pdf

Tool 2: Stakeholder network mapping

The focus of this tool is on mapping stakeholder networks (i.e. relationships between stakeholders), rather than just identifying and assessing individual stakeholders. The tool consists of constructing a stakeholder network map to identify how organisations and institutions relate to each other in the context of socio-economic transitions. The tool as described here has been adapted from the work of UNDP's Accelerator

Labs in Myrnograd and Chervonograd in Ukraine¹² as well as Tool 8 of the ICMM Community Development Toolkit.¹³

The digital tool developed by UNDP used kumu.io, which enables the mapping results to be generated in a visual format. The following steps are used to create a stakeholder network map:

Step	Guidance
1. Collect and input available data on organisations	 Create a database of identified organisations and institutions in the community. These could be businesses or companies, government bodies, community groups, schools, churches, mosques, sports teams, co-operatives, etc. Identify 2–3 selection criteria to distinguish organisations and collect data from available sources on the chosen selection criteria. Organisations may be characterised by a combination of: Relative prominence (represented, for example, by the number of employees or annual revenue, i.e. quantitative data). Interest in mine closure (represented, for example, by the likelihood of being impacted by layoffs or loss of community development resources, i.e. qualitative data. Input the data into kumu.io. Organisations will be represented as dots on the map, with their relative size
	reflecting their prominence and/or interest in mine closure.
2. Conduct community- level analysis	The chosen selection criteria may not fully reflect which organisations are important to people and/or relevant to mine closure, or the interrelationships between organisations. To collect this information and further refine the map, the following steps are also recommended:
	1. Field research by social media to identify community perspectives and sentiments on organisations.
	 2. A workshop enabling community members to visually represent the importance of, and relationships between, organisations: Convene a workshop including representative members of affected communities – this should include women, youth, and other underrepresented or vulnerable groups. Using pre-prepared paper circles of different sizes (with sizes representing relative importance), community members agree on which circle represents which organisation. Lively discussion usually ensues, enabling a more nuanced understanding of the importance of the organisations. Draw a large circle on the ground representing the community and ask community members to place the circles inside or outside the circle. The positions of the circles indicate how central the organisation is to the community, and their positions relative to one another indicate the relationships between them. 3. Further interviews with representative members of affected communities, focusing on identifying the importance of and relationships between organisations, as well as how they will be affected by mine closure.
3. Continuously organise, refine and label data	The data in the system maps can be arranged to adjust the visibility of dots. Organisations can be labelled with keywords such as type of business or area of expertise, and filtered by sector or scale. They can also be sorted by numerical values such as employee headcount or revenue, and qualitative values such as their vulnerability to impacts related to socio-economic transition. Regular updates and reviews of the map with stakeholders will help create a visual representation of the community that becomes more accurate with each iteration.

 $^{12.\,} UNDP.\, 2022.\, The\, Butterfly\, Effect,\, Step\, 1:\, System\, Mapping.\, Oksana\, Udovyk.\, Webpage.$

^{13.} ICMM. 2012. Community Development Toolkit: A set of 20 revised and updated tools intended for use throughout the mining project cycle. London: ICMM.

Requirements for mining companies

Staffing requirements for this tool are low, with only a small number of company representatives required to collect data and conduct community-level analysis; an additional facilitator may be required if a workshop is conducted.

Time requirements for this tool are moderate; a few weeks are required to gather the information required to construct the map, following which periodic data refinement continues only in the background.

Cost requirements are low for the tool; targeted funds are not required for data collection and input, and may only be required for external facilitators or communicators at the community-level analysis stage.

Staffing			
Time			
		_	
Costs			
	l		
Low	Med	dium	High

Applicability

Stakeholder network mapping can be used within all multistakeholder approaches to socio-economic transition, as a means to identify key organisations for engagement and inclusion in convening, planning, implementing and monitoring these processes.

Additional resources

- Udovyk, O. 2022. The Butterfly Effect, Step 1:
 System Mapping. UNDP Accelerator Labs: Ukraine.
 https://www.undp.org/ukraine/blog/butterfly-effect-step-1-system-mapping
- ICMM. 2012. Community Development Toolkit Tool 8: Institutional Analysis. London: ICMM.
 https://commdev.org/wp-content/uploads/pdf/publications/ICMM-Community-Development-Toolkit.pdf

Tool 3: Partner capability assessment

Adapted from Tool 4 of the ICMM Community
Development Toolkit,¹⁴ the partner capability assessment
enables users to: (1) identify the capabilities, capacities
and resources available to potential partner stakeholders;
(2) assess critical gaps and future capacity-building
needs; and (3) consider the suitability and sustainability
of potential partnerships. In the context of socioeconomic transitions, the assessment can ensure that
the partnerships invested in will likely be able to continue
to benefit local communities after the mine has closed.

The assessment can be used by mining companies to evaluate partnerships in general, but is specifically suited

to collaborations between companies, government, and community organisations and/or NGOs.

It involves three steps. First, an assessment is undertaken to understand the benefits of the partnership and the organisation's own motivations for partnering. Second, an internal SWOT analysis is conducted to understand the value proposition for each partner in the partnership, and to help ensure that future discussions surrounding partnership needs are informed and productive. Third, partnership conversations are held between potential partners with a view to reaching broad-level agreement to address priority development initiatives through partnership.

1. Partnership Assessment

	Key criteria
Partnership assessment	 Priority areas for development and/or investment that would be of mutual interest to the different parties Financial advantages and challenges (e.g. whether partnering will allow contributions to be matched by others, or if the proposed investment will be in a new thematic area for a partner) Operational effectiveness (e.g. experience and expertise of partners in potential programs and functions) Outreach of partners (e.g. regions, communities, relationships and networks) Capacity of partners Human resources needed and available (e.g. staff sufficiently trained for program implementation) Legitimacy of partners (e.g. whether partners are established or experienced organisations) Long-term sustainability of partnership (e.g. whether partners are well established and whether they have access to funding/support) Any negative impacts of a potential partnership
	Key questions
Internal assessment	 Would the partnership have the support of key internal stakeholders? What financial and human resources are available to support the partnership? What technical resources are available (e.g. accountancy, legal)? Is there agreement within the organisation on the objectives and expected outcomes of the partnership? Do internal stakeholders understand the resources and time required to develop and implement the partnership?

2. SWOT analysis

For each partnership consider:	Company/organisation	Government body	NGO/CSO
Strengths			
Weaknesses			
Opportunities			
Threats			

^{14.} ICMM.2012. Community Development Toolkit: A set of 20 revised and updated tools intended for use throughout the mining project cycle. London: ICMM.

Conversations should be informed by the preceding SWOT analysis to be mutually beneficial. The following action list may be useful in arranging the required discussions.

3. Partnership conversation

Action	Responsibility	Deadline
Establish communications with potential partners		
Explore possible roles and resource commitments of prospective partners		
Assess potential partners' capacity to contribute and maintain support for the partnership		
Validate, with external stakeholders, assumptions in the partnership assessment		

Requirements for mining companies

Staffing requirements for this tool may increase depending on the number, complexity, and communication needs of partnerships.

Time requirements for this tool are high as multiple assessments and multi-level meetings must take place to secure strong partnerships.

Base cost requirements for this tool are low, but navigating complex contexts surrounding potential partnerships, or resourcing and capacity gaps, may increase costs.

Applicability

The partnership capability assessment is particularly suitable for two multistakeholder approaches to socio-economic transition:

- Regeneration/development coalitions:
 The assessment can help identify opportunities for effective and sustainable partnerships to implement economic regeneration, remediation and enterprise development initiatives.
- Post-mining joint ventures: The assessment's partnership focus is well-suited to guide the formation of joint ventures between companies, government and NGOs to undertake usually commercial activities around former assets.

Additional resources

Low

ICMM. 2012. Community Development Toolkit:

A set of 20 revised and updated tools intended for use throughout the mining project cycle. London: ICMM. https://www.icmm.com/website/publications/pdfs/social-performance/2012/guidance_community-development-toolkit.pdf

Medium

Tool 4: Community scenario planning and visioning

Based on the Future Search methodology developed by the Future Search Network,¹⁵ the community visioning exercise brings together a large group of stakeholders within a community to create a shared vision for its future. The exercise comprises a 2–3-day conference which explores the past, present and future of a community. It is task-focused; the aim is to establish common ground between participants, on which a strategic action plan can be developed for the future of the community post-mine closure.

The exercise can accommodate 60–100 participants, divided into groups with equitable representation of different stakeholder groups. A large group of stakeholders should be included overall, representing a significant cross-section of all parties with a stake in the outcome of mine closure – that is, those who have authority, resources, expertise, and information; and those who will be affected. Vulnerable or underrepresented groups should also be specifically targeted. The stages in the process are as follows:

Stage	Description	Guiding questions ¹⁶
1. Examine the past	Groups construct timelines of key events in their own lives and the experience of the community, before the mine (if applicable) and during mining operations.	 Which time frame is most important to understand (10/15/20 years ago)? How would you describe your community? What do people do for a living? What are the land, soil, animals and vegetation like?
2. Explore current events, impacts and developments	Groups create a mind map of events, developments and impacts related to the mining operations and imminent mine closure which are affecting them now, identifying the most important ones. They then describe what they are doing now about key events, and what they are "proud of" and "sorry about".	 What are the concerns or problems relating to the mine? What do you want to see changed or improved? What are good things that should be maintained? What are you doing to respond to key issues? What is something you are proud of doing in response to the issues?
3. Identify common ground and develop a vision for the future	Groups describe their preferred future post-mine closure. Groups agree on a community vision which they believe is common ground for everyone, which may be synthesised from common themes in each preferred future.	 What landscape do you want to see here in 10/15/20 years? What lifestyles and livelihoods do you want to see here in 10/15/20 years? What seems to be most important in each vision? What do the visions have in common?
4. Plan for action	Groups confirm the previously identified common ground and write statements confirming the will of everyone present. Volunteers begin to develop and sign up to implement action plans.	What are the immediate next steps we can take to implement our vision? Who has the best experience, interest, and capacity to take a certain action?

To get the best results from community visioning, the process should be inclusive and take into account various settings, including rural or urban, and more or less literate communities.

The following is a list of practical considerations for the effectiveness of the visioning exercise.¹⁷

^{15.} Future Search Network. 2010. Future Search Methodology. Webpage.a.

^{16.} Chitakira, M. 2024. Chapter 35: Community visioning. In F. Vanclay and A.M. Esteves. 2024. Handbook of Social Impact and Assessment. pp. 547–561.

^{17.} Ibid.

Element	Practical considerations
Method and tools	 When deciding which method and tools are appropriate to deliver information or assist participants in representing their vision, facilitators should consider participants' literacy levels and access to resources (e.g. digital devices), if these are to be used.
	2. Options for tools include: - annotated diagrams - mind maps - art and picture drawing
	- discussions and direct ranking of ideas
	infographicsonline reflection tools (e.g. polling and word clouds).
Accessibility and understanding	 Language: Effort should be made to conduct the visioning exercise in the local language. Participants who cannot read or write should still be enabled to participate effectively.
	2. Facilitation pace: Participants should be allowed sufficient time to reflect, discuss, and write down their views before finalising their shared vision.
	 Objectives formulation: Facilitators may need to provide guidance on how to frame specific, measurable, achievable, realistic and time-bound (SMART) objectives.
	4. Nature of concepts and information discussed: Scenarios presented and information discussed should be understandable and relevant to participants.
Group management	 Ensure fairly balanced groups: Representatives from diverse social groups and sectors of the community should be included in participant groups, in order to include as many perspectives as possible.
	 Check on dominant groups: Consider appropriate ways to prevent any one stakeholder group from dominating the conversation, and enable all stakeholder groups to have their view fairly represented in the combined vision.

Requirements for mining companies

Staffing requirements for this tool are low.
Resourcing is only needed to plan and facilitate the conference.

Time requirements for this tool are low. The conference only requires 2-3 days.

Cost requirements are low, and likely only limited to organising and facilitating the conference, and providing materials for participants.

Costs

Low Medium High

Applicability

Community visioning can be used within at least the following two multistakeholder approaches to socio-economic transition:

- Mine closure consultative groups
- Community-level transition initiatives

These are all either at the convening or planning stage, as the ability to develop a shared community vision is most helpful here.

Additional resources

- Future Search Network. 2010. Future Search
 Methodology. Webpage. https://futuresearch.net/about/methodology/
- Chitakira, M. 2024. Chapter 35: Community visioning.
 In F. Vanclay and A.M. and Esteves. 2024. Handbook of Social Impact and Assessment. pp. 547–561.
 https://www.elgaronline.com/edcollchap-oa/book/9781802208870/book-part-9781802208870-46.xml?tab_body=pdf-copy1

Tool 5: Collaborative regional post-mining land use (PMLU) suitability assessment

Developed by Worden et. al,¹⁸ the PMLU suitability assessment is a regional baseline for mining companies to make collaborative decisions on rehabilitation and PMLU, enabling longer-term and more sustainable post-closure outcomes across regions. There are four steps in the assessment methodology.

1. Conduct contextual analysis for PMLUs in each region

Subject matter experts carry out a review of literature and spatial data, along with short online surveys and roundtables, to identify contextual global, regulatory, and regional environmental and socio-economic factors. The relationship between these factors and potential PMLUs is evaluated using the Five Capitals Framework or a SWOT analysis to understand how factors would support or constrain PMLUs.



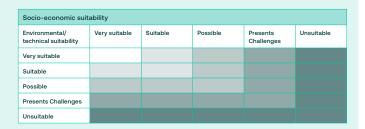
2. Shortlist potential PMLUs in each region

A shortlist is produced by taking into account regulatory constraints, environmental protections, international case studies and land use classification schemes. Outputs are reviewed against the contextual analysis and further streamlined.



3. Undertake a multi-criteria PMLU suitability assessment

Shortlisted PMLUs are assessed against technical criteria based on the potentially most limiting factors for the PMLU assessed, and socio-economic criteria based on alignment with regional aspirations, economic contribution, availability of local capacity, impact on infrastructure and cost.





4. Validate assessment outcomes with regional stakeholders

Assessment outcomes are validated with a sample of regional stakeholders via online surveys and workshops in the form of scoping discussions. In selecting the sample, mapping of stakeholders and their interests is to be carried out, including mining companies, government, local communities and Indigenous Peoples. These surveys and discussions are a starting point to further identify the collaborative potential and opportunities of each PMLU in each region, and further develop collaborative frameworks.

Where multiple stakeholders in the region plan to conduct or oversee the PMLU suitability assessment, a collaboration framework may be developed as follows:

Regional multistakeholder PMLU assessment collaboration framework

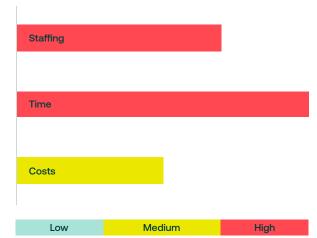
Stage	Guidance	
1. Identify the collaborative potential of the PMLU option	 Key questions: Having identified potential collaborators from amongst broad stakeholder groups (including local government, traditional owners and Indigenous Peoples, community groups, industry associations, and research organisations), is there depth and diversity of stakeholders? Do each of the potential collaborators have the resources/capacity to contribute to the collaboration process; and if not, is there scope for capacity-building and resourcing to fill any gaps? Are more well-resourced organisations willing to support the participation of less resourced ones? Is there a natural project lead among potential collaborators? Are there existing collaborations among stakeholders at regional level, including between mines? Is there strong collaboration between local governments within regions? Do the local governments in the region undertake long-term strategic planning, including strategies for transitioning to post-mining futures? Is there an appetite for collaborative decision-making (i.e. shared power and a willingness to take collective action to implement decisions)? Can potential collaborators meet face-to-face at a central location without hardship (distance, cost, etc.)? Is communication connectivity stable enough to support online collaboration? 	
2. Establish the terms of reference for the collaboration process	Checklist: — Constitute membership of the PMLU collaboration group — Determine the purpose and style of collaboration — Determine the way the group will work — Consider resourcing — Establish the continuity of the group and frequency of dialogue	
3. Adhere to the nine principles of collaboration	Principles of collaboration: - Common goal - Reciprocity - Trust - Mutual respect - Group awareness - Goodwill - Commitment - Cohesiveness - Complementarity of resources	
4. Assess PMLU suitability	Use the four steps in the assessment methodology described above this table and consider the following key questions: Does the region's environmental context support the potential PMLU? Could the region's environmental context support the potential PMLU with minor adaptations that are technically and financially feasible? Does the region's socio-economic context (strengths and constraints) support the potential PMLU? Does the potential PMLU project meet the aspirations, views and knowledge of regional communities? Is there regional familiarity with the PMLU? Does the potential PMLU meet regulatory requirements (including environmental approvals)? If not, is the government likely to support an amendment to enable the PMLU project to proceed? Is the potential PMLU project aligned with local/state/federal policies? Is the potential PMLU project aligned with relevant global trends? At a high level, does the potential PMLU project make business and financial sense (and warrant undertaking due diligence in the future)? Is there a demand for the PMLU in the region, across the state or nationally? Based on responses to questions 1–9, is the potential PMLU likely to have broad appeal at local, regional and state levels?	

Requirements for mining companies

Staffing requirements for this tool are somewhat high, as resourcing is needed to carry out contextual analysis, undertake the core assessment, and develop collaboration if required. Demands may also increase based on the complexity of the situation.

Time requirements for this tool are high, as the process includes contextual analysis, gathering survey data, stakeholder mapping, and surveys and further discussions with stakeholders and potential collaborators.

Cost requirements for this tool are moderate assuming the ability to internally build expertise to carry out the assessment. Increased costs may be incurred at the collaboration-building stage.



Applicability

The collaborative regional PMLU suitability assessment can be used for six multistakeholder approaches to socio-economic transition:

- Regional planning processes
- Regeneration/development coalitions
- Social investment transition foundation, trusts and funds
- Land and asset trusts
- Post-mining joint ventures
- Economic development investment vehicles

This tool is highly flexible and can be applied across regions and stakeholders to enable collaborative decision-making on a wide variety of post-mine closure planning and implementation efforts.

Additional resources

- Worden, S. et al. 2024. 'Regional post-mining land use assessment: An interdisciplinary and multistakeholder approach'. *Resources Policy* (89), pp. 1–14. https://www.sciencedirect.com/science/article/pii/S0301420724000473
- Beer, A. et al. 2022. Post-mining land uses. Perth:
 CRC TiME Limited. Project-1.2-Final-Report-5-May-2022-Approved.pdf (crctime.com.au)

Tool 6: Re-purposing assessment

The repurposing of sites post-closure involves finding a new purpose that takes advantage of site characteristics to enable economic productivity or other beneficial uses. Not all closed sites will be amenable to repurposing. The repurposing assessment tool, adapted from Tool 4 of the ICMM Integrated Mine Closure: Good Practice Guide, 19 helps identify and evaluate the

feasibility of options for repurposing. For best results, the assessment should be conducted by research experts, with joint input from the company and other stakeholders involved in mine closure, including local government agencies, communities, and NGOs.²⁰

The tool outlines the evaluation process as follows:

Step	Guidance		
1. Consult communities and engage stakeholders	 Ensure a people-centred, inclusive assessment process enabling a diverse range of stakeholders to consider potential repurposing scenarios. Ensure that regional identity and aspirations are key components of repurposing planning and implementation. Engage in local consultation, participation and consensus building. Utilise effective forums and decision-making models to enable the inclusion of both stakeholder expectations and technical expertise.²¹ 		
2. Collect necessary information for evaluation	Basic information which should be available from closur includes: — Population density and distribution — Socio-economic context — Identification of Indigenous communities — Environmental impacts — Status of landscape rehabilitation — Soil and water contamination — Legal issues (e.g. landownership) — Areas/buildings available for use and potential issue — Water rights — Capability of future operator — Local business partnering opportunities — Regional and local plans		
3.Identify site characteristics which constrain or facilitate repurposing	External infrastructure aspects: - Industrial context - Access via airport, rail, major roadways - Access to electric transmission lines - Available power options, including renewable energy potential - Tourism potential - Proximity to communities - Proximity to other "compatible" industries - Land zoning/tenure	Internal infrastructure aspects: — Availability and condition of buildings — Site utilities — Site transport — Existing permits for water abstraction and discharge, air quality, waste treatment or disposal — Land contamination and feasible remediation levels	

^{19.} ICMM. 2018. Integrated Mine Closure: Good Practice Guide (2nd edition). London: ICMM.

^{20.} Singh, A., Agarwal, S. and Prabhat, A. 2024. 'A multi-criteria decision framework to evaluate sustainable alternatives for repurposing of abandoned or closed surface coal mines'. Frontiers in Earth Science (12).

^{21.} Holcombe, S. and Measham, T. 2024. CRC TIME Project Concept Brief: Developing and trialling a framework to guide regional repurposing of closed and abandoned mines in Queensland: a people-centred approach.

4. Develop indicators and shortlist potentially feasible options for repurposing

- Develop a set of indicators based on the most relevant factors from the information gathered about the environment, socio-economic conditions, communities and site characteristics.²²
- Then, use the indicators to create a shortlist of repurposing options, in a stakeholder-inclusive decision-making process.

Residential and industrial options:	Non-residential and non-industrial options:	Power generation options:
 Regional planning (e.g. future residential growth area) Mixed use and industrial use Other infrastructure or buildings Water supply or treatment facilities 	 Forestry, agriculture, rangeland Solid and hazardous waste management/ storage Communications infrastructure Mining or metallurgy research and development Deep-water port Water supply for agriculture/farming purposes Carbon sequestration 	 Solar farm projects Wind farms Small-scale hydroelectric systems Waste-to-energy, biofuels and other renewables.

Requirements for mining companies

Staffing requirements for this tool are moderate; significant resourcing is needed to collect the necessary information about the site, its surroundings, and perspectives from stakeholders, but it is possible to limit the scope of work.

Time requirements for this tool are high, as it involves a potentially rigorous information collection process, indicator development, and analysis of options.

Cost requirements for this tool are low, with the assessment not required targeted funds to be used.



Applicability

The repurposing assessment tool can be used for six multistakeholder approaches to socio-economic transition:

- Regional planning processes
- Regeneration/development coalitions
- Social investment transition foundations, trusts and funds
- Land and asset trusts
- Post-mining joint ventures
- Economic development investment vehicles

The tool is highly flexible and can be applied to assess the feasibility of a wide variety of post-mine closure repurposing alternatives.

Additional resources

- ICMM. 2018. Integrated Mine Closure: Good Practice Guide (2nd edition). London: ICMM. https://www.icmm.com/website/publications/pdfs/environmental-stewardship/2019/guidance_integrated-mine-closure.pdf?cb=60008
- Holcombe, S. and Measham, T. 2024. CRC TiME
 Project Concept Brief: Developing and trialling a
 framework to guide regional repurposing of closed
 and abandoned mines in Queensland: a people centred approach. https://crctime.com.au/macwp/wp-content/uploads/2024/05/CRC-TiME-Prospectus-Developing-and-trialling-a-framework-to-guide-regional-repurposing_FINAL.pdf
- Singh, A., Agarwal, S. and Prabhat, A. 2024. 'A multi-criteria decision framework to evaluate sustainable alternatives for repurposing of abandoned or closed surface coal mines'. Frontiers in Earth Science (12). https://www.frontiersin.org/journals/earth-science/articles/10.3389/feart.2024.1330217

22. Singh et al., op cit.

Tool 7: Multistakeholder regional development

A multistakeholder regional development model enables regions around a former mining operation to benefit from scalable and sustainable economic development post-closure. Collaborative approaches to regional development involve establishing a coalition, or series of cross-sector partnerships between the company and key organisations in the region.

This could include government bodies, communities, other companies, academia and research institutions, and financial development institutions. The partnerships allow collaboration on development projects of mutual

interest, risk-sharing, and a combination of resources and competencies to create maximum value.²³

The lead organisation for a regional development process is most commonly the regional government, a specialised government agency, or the mining company. The process may also be catalysed collaboratively, following engagement between multiple organisations.

The following shows a typical process for implementing a regional development model:

1. Identify and assess opportunities for socio-economic development

- Spatial and economic analysis is undertaken, taking into account, for example, local infrastructure, demographics, economic conditions, and social issues, to gain a better understanding of what socioeconomic development efforts are truly feasible and will benefit the region, and where these efforts should be focused to maximise value.
- Stakeholder consultations are conducted to validate, streamline and inform findings.



2. Develop partnerships

- Regional development involves building a strong coalition between the company and external stakeholders including government, academia and community groups. Additionally, internal teams and stakeholders should be aligned and coordinated.
- Genuine buy-in from all parties should be secured, and a high level of commitment demonstrated.
- Resourcing and capacity should be discussed, along with measures to fill any gaps.
- Stakeholder consultations are conducted to validate, streamline and inform findings.



3. Plan, implement and scale projects

- Government policies and aspirations, market prospects and community views should be key considerations in planning projects.
- Plans should have a long-term perspective and incorporate measures to communicate information to stakeholders.
- Local teams should be skilled and in direct relationships with affected communities.
- Local clusters, networks and businesses should help lead efforts to build collaboration and skills within the community.
- Financial institutions and market leaders can assist with managing, co-funding and leveraging funds to implement jointly agreed projects at scale.



4. Monitor and evaluate impact

 The progress and impacts of projects and partnerships should be monitored to iteratively inform the long-term socio-economic development strategy.

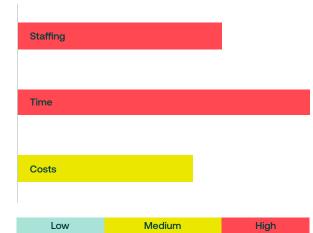
23. Anglo American. 2024. 'Collaborative Regional Development: Independent, scalable and sustainable development.' Webpage. Anglo American.

Requirements for mining companies

Staffing requirements for this model are somewhat high. Resourcing is needed to develop and coordinate the wide variety of partnerships within the coalition, and plan and implement projects. Demand may increase with additional scale.

> Time requirements for this model are high, as it involves a complex partnership and project development process.

Cost requirements for this model are moderate. Though it involves the implementation and scaling of potentially costly projects, costs may be mitigated by financial synergies between partners in the development coalition.



Applicability

The regional development model can be used for three multistakeholder approaches to socio-economic transition, all of which can involve regional-level planning or the implementation of transition-related development projects. Another common element is the sustained involvement of, or the creation of a coalition with, a wide range of stakeholders. The three approaches are:

- Regional planning processes
- Regeneration/development coalitions
- Post-mining joint ventures

- Anglo American. 2024. 'Collaborative Regional
 Development: Independent, scalable and sustainable
 development.' Webpage. https://www.angloamerican.com/sustainable-mining-plan/collaborative-regional-development
- Rio Tinto. 2024. 'Saguenay-Lac-Saint-Jean communities.' Webpage. https://www.riotinto.com/en/operations/canada/saguenay/saguenay-communities
- Samuel J. and Mthenjane, M. 2023. 'How to Improve the Impact and Scale of Social Programs: Anglo American's Collaborative Regional Development.' Webpage and video. Sustainable Business Now. https://www.sustainablebusinessnow.org/posts/ anglo-american-collaborative-regional-development

Tool 8: Town Transition Tool

Developed by the Centre for Social Responsibility in Mining (CSRM) at the University of Queensland's Sustainable Minerals Institute, ²⁴ the Town Transition Tool offers a way to bring together stakeholders to plan for a town's future as it prepares for mine closure. The tool is a diagnostic instrument which brings together mining companies, community stakeholders and national and/or sub-national governments in sharing information and

ideas regarding a town's opportunities and challenges that have emerged and will emerge due to mine closure.

The tool is usually implemented in two stages, each with different stakeholders involved. Experienced facilitators lead a structured interaction based on the Five Capitals Framework to build a shared understanding of dependency on the mine and future opportunities.

Internal workshops

Stakeholders: Mining company and national and/or sub-national government.

Process: Facilitators guide participants through a series of questions organised around the Five Capitals Framework, assisted by relevant contextual information. A report is automatically created with the meeting's key takeaways, and shared with participants.

External workshops

- Stakeholders: Mining company, national and/or sub-national government, community members.
- Process: Workshops are held at least 3-4 weeks after the internal workshops to allow stakeholders to review the internal workshop report. The format is similar to the internal workshop. The objectives are to validate the previous report and assign new quantitative and qualitative values to relevant indicators of the town's future prospects. A final report capturing all workshop data is then created and shared with participants.

Requirements for mining companies

Staffing requirements for this tool are moderate, with only a limited number of company representatives involved.

Time requirements for this tool are somewhat high as meetings may occur more than once a week.

Cost requirements for this tool are low, since major costs are mostly limited to hiring an external communicator.



24. Worden, S., Mackenzie, S. and Bourke, P. 2022. Understanding local readiness for closure – initiating a multistakeholder participatory approach. Brisbane: CRC TIME Limited. https://crctime.com.au/macwp/wp-content/uploads/2022/05/Project-1.4_Final-Report.pdf

Applicability

The Town Transition Tool can be used for at least two multistakeholder approaches to socio-economic transition:

- Mine closure consultative groups: The tool's structure can be used to conduct multistakeholder consultations to make all stakeholders aware of key community priorities and challenges in view of mine closure.
- Community-level transition initiatives: The data collection and evaluation conducted by both workshops can help identify a baseline for future local-level transition initiatives in a mining community that faces closure prospects.

- Worden, S., Mackenzie, S. and Bourke, P. 2022.
 Understanding local readiness for closure initiating a multistakeholder participatory approach. Brisbane, Australia: CRC TiME Limited. https://crctime.com.au/macwp/wp-content/uploads/2022/05/Project-1.4_Final-Report.pdf
- Worden, S., Mackenzie, S. and Bourke, P. 2022a.
 Initiating a multistakeholder participatory approach:
 The Rosebery case study. Brisbane, Australia: CRC
 TiME Limited. https://crctime.com.au/macwp/wp-content/uploads/2022/05/Project-1.4_Case-Study_Initiating-a-multistakeholder-participatory-approach-to-mine.pdf
- Everingham, J. et al. 2020. Participatory processes, mine closure and social transitions. Centre for Social Responsibility in Mining, The University of Queensland, Brisbane, Australia. https://www.mineclosure.net/media/resources/350/
 publicpartfinal20200315.pdf
- Everingham, J. and Mackenzie, S. 2019. Conference:
 IAIA19: Evolution or Revolution: Where next for impact assessment? Brisbane, Australia: The University of Queensland. https://conferences.iaia.org/2019/uploads/edited-presentations/714_Everingham_Assessing_social_impacts_closure_IAIA19_postConf.pdf

Tool 9: Participatory monitoring committees

Participatory monitoring committees oversee activities to monitor specific parameters and impacts, with a view to identifying key problems and following up with measures to resolve them. These kinds of committees are most commonly used to monitor environmental impacts, but they can also monitor social impacts related to mining and socio-economic transitions. Committees should comprise representatives of key

stakeholders affected by or with an interest in the parameters being tracked. Potential groups can include community representatives, local research institutions, community-based organisations, NGOs, and potentially representatives from the mining companies and local governments.

A participatory monitoring committee typically has four main operational stages, as shown below.²⁵

Stage	Description	Key considerations
1. Convene and organise	The committee is convened, usually individually or jointly by leading organisations. Then, the committee prepares itself by understanding the socio-economic and environmental context of mine closure, building the team, and agreeing on the scope and financing for its work.	 Challenges such as long travel in rural areas, the need to coordinate multiple communities and managing possible conflict, for example, between companies and communities. Sustainable sources of financing, and measures to build trust within communities towards financing sources. Preferred extent of state/government involvement.
2. Prioritise and create a vision	The committee creates a common vision it wants to achieve, defines specific goals and identifies key priorities. The main priority should be to supervise the socio-economic and environmental effects of mine closure.	 Appropriate collaborative forums to decide on monitoring priorities and high-level strategy. Measures to enhance community participation, build trust, and maintain a constructive relationship with the government. Measures to raise awareness and build networks to handle community and environmental issues.
3. Monitor and communicate	The committee executes its main task: designing and implementing a monitoring programme. Usually, a communication plan to report to stakeholders and communities on progress will be designed in parallel.	 Specific parameters to monitor in the short and long term, method, and frequency of monitoring. Preferred extent of committee involvement in design and implementation of monitoring activities; most committees have a technical secretariat (NGOs, researchers and consultants) to support their work, and mainly oversee the monitoring programme. Planning for communication with communities, the monitored company, and the government regarding the monitoring process and its results.
4. Follow up	The committee's most important contribution is the implementation of relevant mitigation measures following the results and identification of problems from the monitoring programme, and improving the design and/or implementation of the mine closure plan.	 The main concerns uncovered through the monitoring programme, and the immediate mitigating measures which are possible to take. Building mutual trust among committees, companies, government and the community to enable cooperation in handling the impacts of mine closure.

^{25.} Taken from: Pareja, C., Xavier, A. and Daitch, S. 2019. Participatory Environmental Monitoring Committees in Mining Contexts: Lessons from Nine Case Studies in Four Latin American Countries. United Nations Development Programme: New York.

Within each stage of operation, four fundamental and interrelated dimensions should be strengthened to ensure the effective functioning of the monitoring committee, as outlined below.²⁶

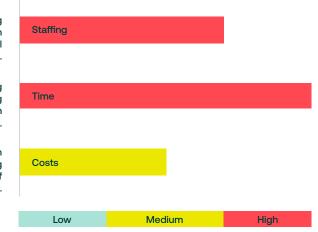
Dimension	Key elements
Internal governance	 Decision-making processes Leadership structure Budget and financing processes Form of election of members Diversity and inclusiveness of member composition Roles and responsibilities of members Relations with other institutions including companies, government and universities Transparency
Learning from the monitoring process	 Generation of knowledge from monitoring activities Technical evaluation and learning skills Procedures to communicate learning Learning culture
Socio- economic conditions	The incorporation of and sensitivity to: The history and culture of the community and region Community perceptions and expectations The local economic context Local livelihoods and way of life The local legal framework
Environmental conditions	The incorporation of and sensitivity to: — Regional geography and climate — Water quality and availability — Flora and fauna — Soil, air and water chemistry — Local environmental regulations and monitoring protocols

Requirements for mining companies

Staffing requirements for this tool are moderately high as resourcing is required to convene and coordinate stakeholders, along with developing and implementing a monitoring programme. Additional resourcing may be required for follow-up measures.

Time requirements for this tool are high; building coordination, shared priorities, and a long-term monitoring programme requires sustained engagement between committee members and stakeholders.

Cost requirements are moderate, originating mainly from organising the committee and developing a monitoring programme. Costs will increase according to the extent of follow-up measures.



Applicability

This tool is mainly helpful when implementing monitoring committees. Although the monitoring committee's main function is review and oversight, this tool can be expanded to encompass the design and implementation of recommended actions that emerge from the monitoring results.

Additional resources

Pareja, C., Xavier, A. and Daitch, S. 2019. Participatory
 Environmental Monitoring Committees in Mining
 Contexts: Lessons from Nine Case Studies in Four
 Latin American Countries. United Nations
 Development Programme: New York. https://www.undp.org/publications/participatory-environmental-monitoring-committees-mining-contexts

26. Taken from: Pareja et al, op cit.

Tool 10: Regional skills transition planning

Adapted from the Mining Workforce Transition tool developed by Canada's Mining Industry Human Resources Council,²⁷ this tool offers a way for companies, governments and local stakeholders to cooperate in supporting mining workforces with their skills transition needs on a regional level.

By identifying strategies for skills transition and development, the tool also enables increased levels of regional employment and procurement which further enhances locally retained value. Skills development therefore offers the potential to reduce economic dependency on regional mining activities and to support the development of more diversified regional economies in the context of socio-economic transitions. Improved skills are an enduring form of asset, providing long-term and multiple benefits for mining regions.

Having an effective regional skills transition plan is also beneficial for the mining industry. While an asset may be undergoing closure at the time of the plan's implementation, the mine may reopen at a later date or other mines may open in the same area. Having implemented an effective skills transition plan may be vital to retain certain employees or re-hire them at the time of the new opening. Poor treatment of laid-off workers may result in future labour shortages for companies with adverse effects on business, sales and staffing.

While skills transition planning may vary depending on context, a typical path to carry out regional skills planning will resemble the following:

- 1 Mine closure comes into view; the company begins preparing for closure and a significant layoff.
- A Skills Transition Agreement is signed between all stakeholders involved. This may include regional governments, company members, civil society organisations and workforce representatives.
- A Skills Transition Committee is established and trained to oversee the implementation of the regional skills transition planning initiatives as per the Skills Transition Agreement.

The committee will typically be led by government stakeholders but also includes company members, workforce representatives, civil society organisations and occasionally external consultants with relevant expertise.

A Skills and Resource Centre is established where government and company stakeholders, with the help of contracted service providers and volunteers, implement skills transition plans following the Skills Transition Agreement.

Implementation usually integrates the results of a needs survey with affected workers to identify priorities and opportunities related to skill development in the region, particularly to determine the types of skills transition support needed.

The type of skills transition support that skills and resource centres may offer to mining workforces will be dependent on the context. However, stakeholders involved in the process should typically consider the following options.

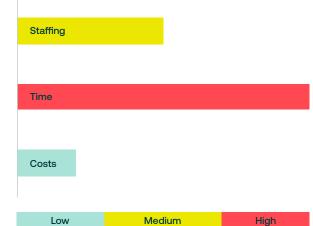
Type of support	Description
Skills certification	Companies can support the mining workforce by working with government stakeholders to develop programs, allowing workers to gain official recognition of their skills. The possession of official certification can help workers transition smoothly into new roles beyond mining industry.
Job search assistance	This is a common form of support that helps workers transition upon mine closure. Companies, governments, and workers' representatives cooperate to help former employees find new jobs by contacting local employers, creating relevant job boards, and providing workers with job search tools such as articles, websites, and job-seeker journals.
Skills transferability support	When moving to a new job position, workers need support in identifying key transferable skills that will improve their employability. Companies and governments can consider working with expert consultants to offer support to mining employees in identifying skills gained during mining careers. This can be done by providing workers with support documents and checklists such as the MiHR Transferable Skills table.
Training programs	Companies and governments can jointly establish funds to support workers' training after closure. This can be delivered by expert consultants and typically includes the most sought-after skills training, covering letter, CV and interview writing training.
Counselling support	Losing a job is a stressful event for most mining workers. Companies should consider supporting former employees' mental health by advocating for the creation of mental health government schemes aimed at workers who have lost their jobs as a result of mine closure.

Requirements for mining companies

Staffing requirements for this tool are moderate, with only a limited number of company representatives involved in the Committee's activities.

Time requirements for this tool are high, since Committee's activities for a Regional Skills Transition Plan typically last more than 2 years.

Costs requirements are low because although full-scale workforce transition projects' costs are estimated to be in the hundres of millions of US dollars, these costs are typically covered by government funds.



Applicability

The Regional skills transition planning tool can be particularly useful for one multistakeholder approach to socio-economic transition:

Regional planning processes: The regional skills
transition planning tool can be used to contribute to
the economic development of a mining region by
improving the human capital of workers who will stay
in the region beyond mine closure.

- Mining Industry Human Resources Council, Canada.
 2020. Mining Workforce Transition Kit: A Tool to
 Support Employees at Mine Closure. https://mihr.ca/wp-content/uploads/2020/03/Mining-Workforce-Transition-Kit.pdf
- Christiaensen, L. et al. 2022. Towards a Just Coal Transition: Labor market challenges and people's perspectives from Wielkopolska. The World Bank. https://documents1.worldbank.org/curated/ en/099052323122090749/pdf/ P17307906aa8ca0b509507052b20780ee1a.pdf

Tool 11: Transition outcome indicators

To support just socio-economic transitions, mining companies can use this tool to appropriate transition criteria and their associated outcome indicators, taking into account the specific needs of the mine and surrounding communities. The following framework, adapted from a framework developed by Synergy

Global Consulting, provides a starting point for assessing these indicators. The relevancy of these indicators will depend on the temporal proximity to mine closure and the timeframe involved (e.g. to mitigate impacts, restore pre-mining baselines, or undertake a full transformation).

Indicator	Description	Specific indicators by time to closure		
category		Mitigation period: >20 years	Restoration period: 20 years	Transformation period: <20 years
		Minimisation of negative impacts	Supporting restoration of pre-mining baseline	Full realisation of a just transition post-mine closure
Environment				
PMLU	Planning for environmentally and technically suitable PMLUs; restoration of land tenure and access; capacity-building of local partners			
Rehabilitation of environment, water, and natural resources	Managing and enhancing the living environment in affected areas			
Health and safety	Assessing and managing environmental and health impacts on communities			
Economy				
Infrastructure and services	Ensuring infrastructure and services provided by the mine are self-sustainable; implementing capacity-building and takeovers			
Procurement and enterprise development	Managing the loss of local procurement through economic diversification of supply chains; providing business support; engagement of suppliers in closure planning			
Employment and skills	Implementing skills development and transition planning; managing loss of employment through retrenchment planning and engagement of affected workers in closure planning			

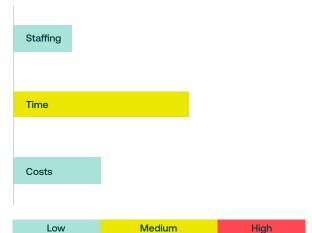
Social				
Community livelihoods, assets and activities	Managing impacts on and developing livelihood assets and activities; establishing partnerships for transitioning projects			
Community development	Managing reduced contributions to community development; implementing self-sustainable projects during the life of mine and for post-closure			
Community engagement and empowerment	Engaging the community in closure planning; improving information-sharing, participation and ownership			

Requirements for mining companies

Staffing requirements for this tool are low as indicator development and monitoring can be done by and in consultation with existing staff and stakeholders.

Time requirements for this tool are moderate; following a more involved period for indicator development, monitoring of indicators may be performed at a frequency

Base cost requirements are low as it is possible to develop and monitor indicators in line with available resources; however, costs may increase slightly through capacity-building and stakeholder engagement within the monitoring process.



Applicability

Transition outcome indicators can be used for all multistakeholder approaches to socio-economic transitions. However, the way indicators are used will depend on the objectives of the approaches being used. For example, planning approaches might only develop indicators, while implementation and monitoring approaches will also develop processes to monitor progress on indicators.

The relevance of different indicators will vary according to the different objectives and contexts of multistakeholder approaches. For example, community-level transition initiatives may focus on economic and social indicators involving community-level or local government-led action; regeneration/development coalitions and monitoring committees may have to take a broad view and develop or monitor a mix of indicators; and economic development investment vehicles will find reliance on economic indicators the most helpful.

- O'Keefe, E. et al. 2021. Initial framework of social indicators for investments in a just transition.
 Synergy Global Consulting (Pty) Ltd. https://www.tips.org.za/images/Initial_framework_of_social_indicators_for_investments_in_a_Just_Transition_Synergy.pdf
- Edwards, J., Bester, V. and Maritz, A. 2022. 'A framework for developing social mine closure criteria'. In A.B. Fourie, M. Tibbett and G. Boggs (eds), Mine Closure 2022: Proceedings of the 15th International Conference on Mine Closure. Australian Centre for Geomechanics, Perth, pp. 813–828. https://papers.acg.uwa.edu.au/p/2215_59_Edwards/

Annexe: Useful resources

ICMM resources

ICMM. 2019. Integrated mine closure. Good Practice Guide 2nd Edition. London: International Council on Mining and Metals. https://www.icmm.com/website/publications/pdfs/environmental-stewardship/2019/guidance_integrated-mine-closure.pdf?cb=60008

ICMM. 2012. Community development toolkit: A set of 20 revised and updated tools intended for use throughout the mining project cycle.

London: International Council on Mining and Metals. https://www.icmm.com/website/publications/pdfs/social-performance/2012/guidance_community-development-toolkit.pdf

ICMM and Palladium. 2022. An Inclusive Growth
Approach to Promote Community Resilience: Skills for
Our Common Future. Issues Brief #3, February 2022.
London: International Council on Mining and Metals.
https://www.icmm.com/website/publications/pdfs/social-performance/2022/briefing_inclusive-growth.pdf

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