



THE UNIVERSITY OF BRITISH COLUMBIA

School of Public Policy and Global Affairs

CREATING AND SHARING VALUE WITH COMMUNITIES IN THE EARLY MINE LIFE-CYCLE: THE CASE OF ERDENE RESOURCE DEVELOPMENT CORPORATION IN MONGOLIA



FINAL RESEARCH REPORT

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EXECUTIVE SUMMARY

From November 2017 to July 2018, a team from the University of British Columbia (UBC) undertook a research project to investigate how exploration companies could maximize the benefits of resource development for host nations and affected communities. The study involved Erdene Resource Development Corporation (Erdene). Erdene is a Canadian mineral exploration company operating in Mongolia. The case study examined ways in which mineral exploration companies could:

1. Create and share value by working collaboratively with others to identify and respond to social problems that intersect with business needs; and
2. Integrate local and international sustainable development goals into operational strategies.

The term “creating shared value” is defined as an economic strategy that seeks to address macro-economic issues and drive outcomes that benefit business and society simultaneously (Porter & Kramer, 2011). While “creating shared value” can have varied meanings to different people, the core concept provides a useful framework for understanding the potential benefits and impacts during the early mine life cycle.

The UBC team used a mixed methods research approach. The research began with a literature review and analysis of media coverage of Erdene from January 2017 through June 2018. The team then conducted one-to-one interviews with 38 purposefully selected people. In addition, one group interview with five participants was carried out. The interviews covered Erdene’s key stakeholder groups both in Canada and Mongolia. These include company representatives, industry partners and influencers, civil society and non-governmental organizations, the media, investors, local government, community representatives, and herder households.

The research concludes Erdene’s community engagement approach has resulted in positive outcomes for the company and its stakeholders. The majority of respondents said Erdene is trusted to engage with the community and to consider community needs when planning its projects. That said, herders are worried about mineral development and mining in Bayankhongor. Their unease is driven primarily by concerns about water availability. The potential for mining to cause environmental impacts to the Gobi pastureland, upon

which their herds and livelihoods depend, is another key consideration. Herder views appear to be generalized to the industry rather than being solely linked to Erdene.

Approximately 25 per cent of external stakeholders interviewed knew about Erdene’s water stewardship work. Stakeholders also mentioned the value received from the company for its long-standing scholarship program begun in 2012. These awards fund continuing education for local high school graduates. Interviewees also attached importance to a new initiative: making available company shares to residents of the two soums closest to the Bayan Khundii project. The share offering was part of Erdene’s cross listing on the Mongolia Stock Exchange in June 2018. This initiative for shared ownership is viewed by regional stakeholders as a key attribute in creating and sharing value from mining.

The research concludes that exploration companies can be positioned to create and share value for the communities in which they operate. Erdene is recognized for its community engagement efforts. The company’s success is attributed to four key factors:

1. A clear **vision** on the importance of sustainable development that is championed by the Board of Directors, senior management and all employees.
2. **Business strategy** to drive sustainable outcomes.
3. A commitment to build healthy, resilient **relationships** with stakeholders; and
4. A focus on **people**. Both to ensure that benefits from exploration and mining projects accrue to all citizens (rather than just to a small number of elites), and ensuring company people have the skills and resources needed to engage with stakeholders.

This project revealed opportunities for future research collaboration to investigate how trust can be nurtured and maintained over time, and the initiatives of companies seeking to secure a social license to operate. Following Erdene as the company advances its Bayan Khundii and Altan Nar projects would give academic researchers, industry and government insight to how exploration and mining companies build and protect their stakeholder relationships as these evolve over the mine life cycle.

TERMS AND ABBREVIATIONS

Aimag: First level administrative division in Mongolia. Equivalent to province. There are 21 aimags in Mongolia

Bagh: Third (smallest) level administrative division in Mongolia. Equivalent to sub-district.

Creating shared value (CSV): A management strategy that seeks the points of intersection between business and society to drive outcomes that benefit both business and society.

CSR: Corporate social responsibility

IFC: International Finance Corporation

NVivo: A software program that uses advanced data management, query, and visualization tools to perform qualitative analysis

Soum: Second level administrative division in Mongolia. Equivalent to district. There are approximately 330 soums in Mongolia.

Share of voice: When company personnel are quoted directly or have information attributed to them within the media article.

Social license to operate: The ongoing acceptance of a company's business practices and operating procedures by government, communities and other stakeholders or interested parties.

VCP: Voluntary Code of Practice on Water Management, established in Mongolia amongst 8 companies on Feb 4th, 2016 for the purpose of promoting the efficient and transparent use of water in the South Gobi region.

INTRODUCTION

Mining is often regarded as the backbone of Mongolia's current and future economic growth. However, the expansion of the sector has created tensions with local communities and the public, especially with regard to environmental management, social impacts, and benefit sharing. Tensions arise partially because those who are directly impacted by mining activities may not believe that the benefits of mining outweigh the associated social and environmental costs.

Mining development in Mongolia has expanded most rapidly in Southern Mongolia's Gobi region, a sparsely populated desert environment that hosts significant mineral resources including copper, gold, and coal. The region has limited access to reliable power, potable water and other critical infrastructure, which may pose constraints for companies to advance mineral projects from exploration to mine development. Many local communities themselves lack access to reliable water and power. For example, only 24 percent of the Mongolian population have access to piped drinking water (WHO/UNICEF, 2015). Even where mines catalyze essential infrastructure development, some communities have reservations about mining and its potential impacts on herding livelihoods and the natural environment.

There is limited academic research on community engagement approaches at the exploration phase of mining projects. Yet it is recognized that exploration is a critical stage for building relationships with stakeholders of prospective mining projects. Exploration is also a time when consideration is being given to project design options (e.g. how to source water for operations or planning for project infrastructure). These decisions can have significant positive (or negative) implications for the communities surrounding mining projects.

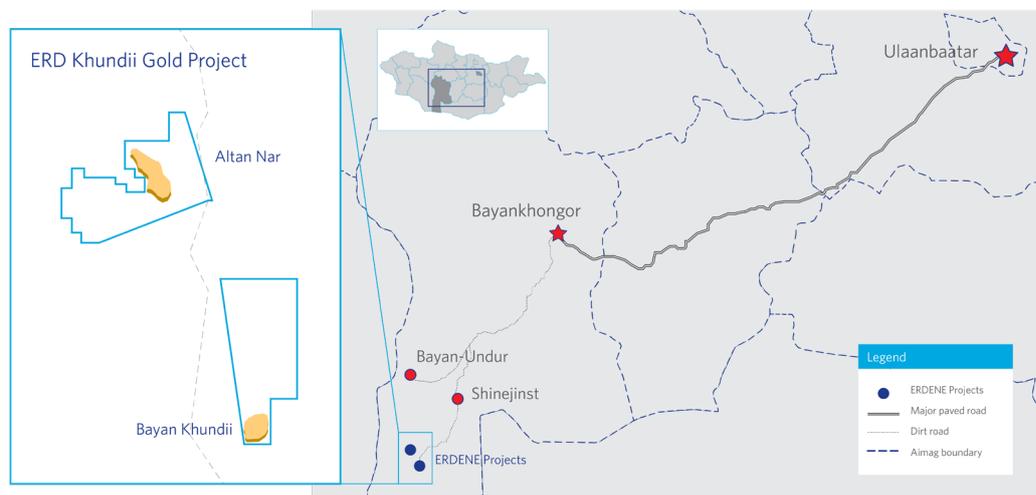
Design options become increasingly difficult to change as a project moves towards feasibility, so it is important to understand the local implications of alternative design options as early in the mine life cycle as possible.

Given the fact that exploration companies are often without sustainable revenues and highly dependent on equity markets for cash, this research considers:

- Can such companies create and share value in the communities within which they operate.
- Moreover, can they demonstrate a value proposition to the myriad of stakeholders with an interest in mining projects?

To investigate the role that exploration companies can play in creating and sharing value in communities proximal to mineral deposits, a team of researchers from the University of British Columbia developed an independent, longitudinal case study (November 2017-July 2018) of the Canadian resource company Erdene Resource Development Corporation (Erdene). Erdene is publicly traded, with its shares listed on the Toronto Stock Exchange (TSX: ERD) and the Mongolian Stock Exchange (MSE: ERDN).

Erdene personnel have been actively exploring in Mongolia for about 20 years. The company has discovered and defined several prospects and deposits in southwestern Mongolia, including Altan Nar, Bayan Khundii, and Zuun Mod. The focus of this research is Erdene's 100 percent owned Bayan Khundii gold project which, as of August 2018, was at the advanced exploration stage of resource estimation. Bayan Khundii is a high grade, near surface gold deposit in a region that has experienced very limited modern mineral exploration and no commercial mining at scale. Erdene is actively working to advance and de-risk Bayan Khundii towards a mine development decision.



RESEARCH METHODOLOGY

The research project was conducted in compliance with the requirements of the UBC Behavioural Research Ethics Board. To secure ethics approval, proposed research projects are evaluated by an independent committee of experts. Their assessment of a proposed study's ethical acceptability is guided by the core principles of research ethics: respect for persons, concern for welfare, and justice.

The research employed multiple methods (Figure 1) and was guided by the overarching research question: Can early stage mine development create and share value in nearby communities?

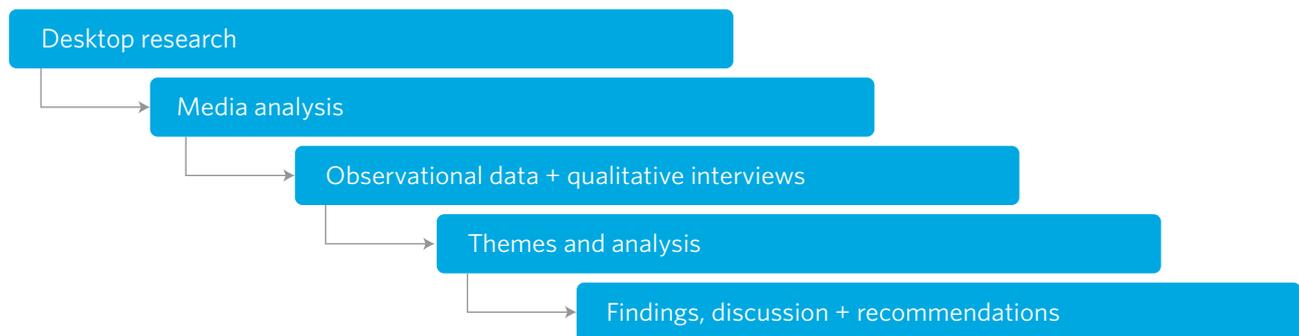


Figure 1. Overview of mixed methods techniques used within the project.

MEDIA ANALYSIS

Media coverage reporting on Erdene during the eighteen-month period from January 2017 to June 2018 was reviewed to assess tone and share of voice¹. To collect the data, two sources were used. The Google search engine was used to collect articles from Mongolian language publications, primarily within the country. Keywords used were “Эрдэнэ Ресурс Дэвэлөмэнт”; “Эрдэнэ

Монгол”; and “Эрдэнэ Ресурс” (English translation: Erdene Resource Development; Erdene Mongol and Erdene Resource). To collect international media coverage the English language search terms were entered into the Factiva database. Factiva is owned by Dow Jones and aggregates content from approximately 30,000 news agencies.

	Mongolian	International (English)
Source	Google	Factiva
Keywords	- Эрдэнэ Ресурс Дэвэлөмэнт - Эрдэнэ Монгол - Эрдэнэ Ресурс	- Erdene Resource Development - Erdene Mongol - Erdene Resource

OBSERVATIONAL DATA

The research included observational data collected during attendance and presentations at industry conferences and a 14-day fieldwork period in Mongolia. This enabled firsthand examination of the company's approach to community engagement and comparison of Erdene with its industry peers. Observational data was used to test and complement qualitative interview results.

¹ Share of voice is when company personnel are quoted directly or have information attributed to them within the media article.

Event	Time and Place	Outcome
The Mineral Exploration Roundup Conference https://roundup.amebc.ca/	January 22-25, 2018 Vancouver, BC, Canada	<ul style="list-style-type: none"> Two in-person interviews conducted Observation of conference presentations on exploration, sustainability and CSR
PDAC https://www.pdac.ca/convention	March 4-7, 2018 Toronto, Ont., Canada	<ul style="list-style-type: none"> Six in-person interviews conducted Attended presentations on current Mongolian mining policies and government views on foreign investment and governance Exposure to industry thought leaders Insight to the sustainability and CSR priorities of the sector
Fieldwork in Mongolia (Ulaanbaatar, Bayankhongor aimag, and Shinejinst soum)	March 12-24, 2018 Mongolia	<ul style="list-style-type: none"> 30 in-person interviews Fieldwork provided context for social, environmental and economic issues and interests
Technical Workshop https://www.commddev.org/south-gobi-water-and-mining-in-industry-roundtable/	March 13-14, 2018 Ulaanbaatar, Mongolia	<ul style="list-style-type: none"> Observation of junior mining companies and major multinational and Mongolian mining companies informed part of assessments of industry leadership.
CIM 2018 Convention https://convention.cim.org/	May 6-9, 2018 Vancouver, BC, Canada	<ul style="list-style-type: none"> Designed and chaired a session on strategies for social license to operate, creating an opportunity for Erdene to get public feedback on the company's approach Presented the preliminary findings from the project that generated audience questions and supported the research analysis.
Resources for Future Generation 2018 http://www.rfg2018.org/	June 16-21, 2018 Vancouver, BC, Canada	<ul style="list-style-type: none"> Presented the findings from the project in a panel Presented on how collaborative partnerships can advance the SDG agenda, with Erdene used as an example.

Table 1. Sources of observational data

SECURING A BROAD RANGE OF STAKEHOLDER OPINIONS

The sample for qualitative interviews was purposefully selected to provide a diversity of perspectives ranging from nomadic herders to company board directors and including multiple groups (Table 2).



Figure 2. Stakeholder sample

In total, 35 qualitative interviews were completed with 38 respondents². In addition, one group discussion was held with five soum level representatives. All interviews were conducted using a semi-structured interview guide (Appendix A).

Interview locations included Canada (Vancouver and Toronto), and Mongolia (Ulaanbaatar, Bayankhongor aimag centre, Shinejinst soum, the Bayan-Khundii project site and Ekhiin Gol oasis). All interviews were conducted in-person, in English and/or Mongolian. Interviews were numerically identified by consent forms to ensure anonymity and confidentiality.

² Three of the 35 interviews were attended by two participants each.

RESULTS

MEDIA ANALYSIS

The Mongolian media search delivered 93 news articles and videos from 49 Mongolian-language news sources. The tone of the news reports was neutral (50 articles) and positive (43 articles). The most significant coverage (66 of the 93 articles) occurred in May-June 2018, coinciding with the company's offering of shares for cross-listing on the Mongolian Stock Exchange.

The Factiva database yielded 63 articles from January 2017 to July 2018. Coverage in the international media was generated primarily as a result of company news releases reporting on the results of drilling programs. While the cross listing attracted moderate coverage (2 unique articles), the Bayan Khundii project generated the most coverage (47 articles) closely followed by Altan Nar (37 articles). The tone of all Factiva-sourced articles was neutral.

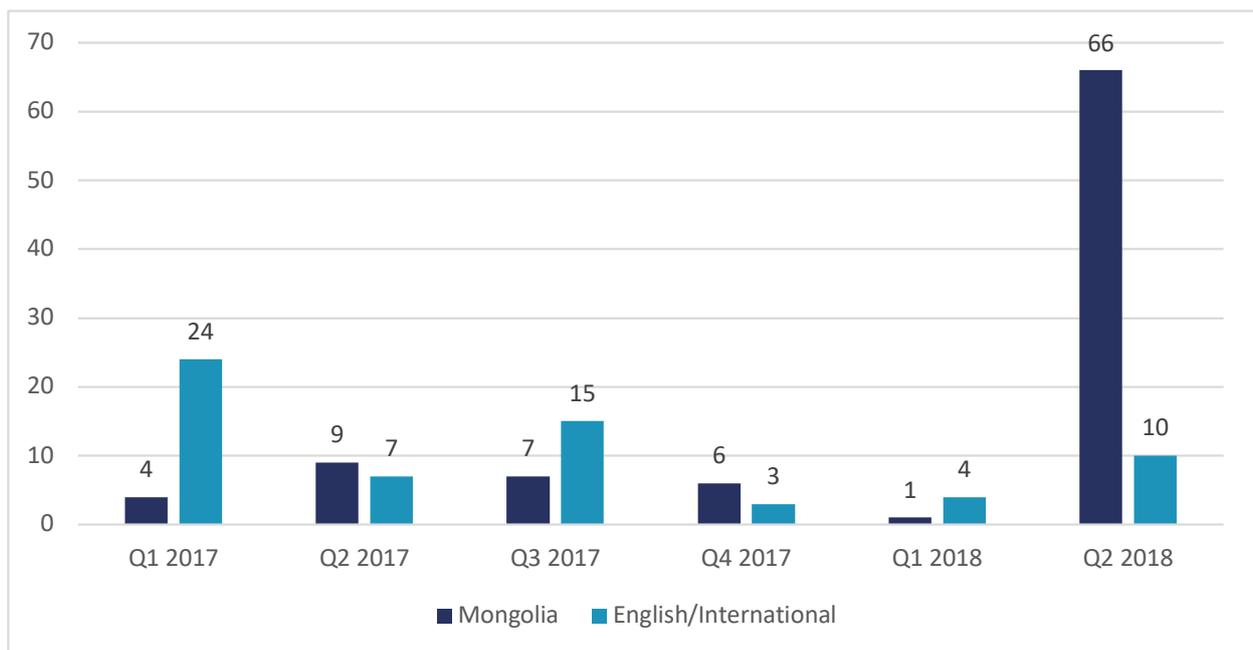


Figure 2 - Volume of Erdene-specific media coverage from January 2017 to June 2018

ANALYZING THE FINDINGS

Through the media analysis and desktop research, keywords were used to classify information (Table 3). All interviews were transcribed and analyzed using these key words.

Research Coding Keywords					
Expectations	Trust	Credibility	Relationships	Engagement	Opportunities
Benefits	Impacts	Creating shared value	Water	Exploration	Reputation

Table 3. Key words – or constructed codes – developed for data analysis

THEMES

NVivo software (QSR 2018) was used to explore connections within and across data sets. This approach helped to identify five overarching and inter-related themes vis-à-vis exploration and mine development. These themes are listed in Table 4. Associated topics for each theme are listed in the column below the theme heading.

Economic development	Herd welfare	Environment	Water	Governance
<ul style="list-style-type: none"> ▪ Jobs ▪ Opportunities ▪ Local procurement ▪ Small & medium enterprises ▪ Value-add ▪ MSE cross listing 	<ul style="list-style-type: none"> ▪ Declining herd health: impact of dust/climate change/ drought/ harsh winters ▪ Conflicts over pastureland and water 	<ul style="list-style-type: none"> ▪ Climate change ▪ Air quality ▪ Harsh winters/ droughts ▪ Decreasing pastureland ▪ Soil erosion ▪ Impacts of roads ▪ Micro mining 	<ul style="list-style-type: none"> ▪ Availability ▪ Quality ▪ Need for testing/ monitoring ▪ Withdrawal impacts on surface and aquifer water 	<ul style="list-style-type: none"> ▪ Capacity ▪ Corruption ▪ Policy uncertainty ▪ Low trust ▪ Lack of transparency

Table 4. Overarching and inter-related research themes

ISSUES

When asked to identify the most important issues facing the interviewee's company or community, four topics were most commonly raised (Table 5):

1. The negative reputation of the minerals industry;
2. Challenges related to governance of the sector;
3. Water availability in the Gobi region; and
4. Concerns about the environmental impacts of mining.

Several of these issues are inter-related, e.g. water and environment. Importantly, company representatives appear attuned to stakeholder concerns, with many points of common interest raised independently by company representatives and stakeholders alike.

Although mining in Mongolia suffers from a negative reputation, one interviewee said:

“There is a recognition – sometimes a bit grudgingly – that mining represents an integral and essential part of today’s economy that can’t be sacrificed and must continue. On the other hand, I think there is a sense that Mongolians feel they are losing control of their own destiny by inviting outsiders to come in and exploit their resources.”

Concerns about the environmental impact of mining were frequently raised by respondents. Some of the impacts may be the result of other pressures, such as overgrazing and climate change. However, as the industry is visible, it tends to be blamed for adverse environmental impacts, such as dust, damage to a fragile ecosystem, desertification or water scarcity. For example, one interviewee said:

“The pasture is getting smaller and smaller. [Because of] mineral exploration projects it really feels that we are losing pastureland.”

In addition, there are concerns about the foreign ownership of Mongolia’s natural resources. Some stakeholders worry that foreign companies will exploit non-renewable resources and leave the community with nothing but adverse environmental and social impacts from mining.

Perceptions shape local stakeholder realities. Companies with a strong engagement strategy recognize the potential for stakeholder views – regardless of their scientific or evidence basis – to potentially trigger conflict. Good strategies lead companies to take action to treat perceptions as legitimate concerns and to take measured steps (commensurate with the resources available at a given stage of the project) to address any issues.

Table 5 illustrates the points of common ground arising from the issue identification data.

MINING’S REPUTATION

“First of all, we have micro mining and ninja mining that have spread negative practices and perceptions of mining all around”

“The only thing I know about mining is that they are taking the valuable thing and leaving the rest.”

“In many companies, illegal practices and cheap practices that are harmful to the environment are used.”

“I don’t think these large multinational corporations and all their satellite offices necessarily operate in the same way.”

“The worse companies are the small Mongolian companies, especially in the gold sector. They just exploit. They don’t care at all about environmental standards – informal and formal.”

“Because of the small and irresponsible companies, the whole community was against mining. It only takes one bad actor.”

Stakeholder groups (# of respondents)	Industry (2)	Investor (1)	Influencers (5)	Local government (4)	Local comm. (4)	Herders (3)	CSO/NGO (9)	ERD employees (7)	ERD Board (3)
Issues (order based on # of mentions)									
Negative industry reputation (13)	2		3		1		3	4	
Sector governance (12)	1		2				3	4	2
S Gobi water (11)				1	4	2	1	2	1
Environment (10)			3	3	1	3	3		
Pastureland (7)			1	2	1	3			
Animal/herd welfare (6)			2	2	2	2			1
Employment/eco dev (6)				2	2		2		
Access to capital (5)		1					1	3	
Trust (4)							1	2	1
Managing expectations (4)	1		1					2	
Transparency (3)	1						2		
Cultural change (3)							2	1	
Other* (1)									

Table 5. Issues raised most frequently by respondents to Q1 in the interview guide. Total mentions can exceed stakeholder group numbers due to linked issues. *Other topics include lack of electricity, environmental issues associated with “ninja” miners, low income, sector’s lack of engagement (1 each).

IMPRESSIONS OF ERDENE

A sub-set of 17 interview respondents were purposefully selected to answer a series of quantitative questions relating to Erdene, and to compare Erdene to other companies operating in the sector in Mongolia.

Stakeholder group	# respondents
CSO/NGO	9
Industry	1
Local community	4
Influencers	2
Investors	1

Table 6: Purposefully selected quantitative interview sample

Perceptions of the company within the purposefully selected sub group were very positive:

"I've known them for a while. I think their approach to community issues has been one that is not paternalistic, that is pretty open. I see a strong commitment from the people I deal with - who are in the community relations functions - to doing things well. To doing things more collaboratively."

A strong majority of respondents (92%) described their impression of Erdene as positive. While some respondents did not feel they had sufficient information to answer all questions, none held a negative view of the company. Across all categories, 90% or more agreed:

- Erdene is better than other exploration companies;
- Erdene operates in an environmentally sound manner;
- Erdene communicates effectively within your community;
- Erdene's project "is managed by people you can trust";
- The company is responsive to community concerns; and
- Erdene finding a mineable deposit would benefit the community.

Despite these positive impressions it is important to flag that some concerns were raised by stakeholders in local communities. These are detailed on the following page.

ERDENE

"Compared to other exploration license holders, Erdene works closely with [its stakeholders]. They are one of the best companies working in the province and the soums."

"I trust them to be a company with which I can collaborate for future projects."

"They have stuck with Mongolia through thick and thin. They are not just trying to understand Mongolia for their own goals. It seems to me they have a real network there and are part of the business culture and society there. They strike me as being different in how open they are to exploring different ideas"

"I think the perception is that Erdene is anxious to do the right thing and are going about their work at this stage in a careful way."

"They make a contribution to the local community. They provide charity, assistance, scholarships like that. They fund the prizes for the schools sport competition."

ISSUES

"The bad experiences of [the past] are stuck so hard in the heads of the people today. 'Mining is wrong' - is the perception . . . the herders are not able to get out of this mindset.

"Every time we receive comments, I issue an official note to the company's management...I call [the management] and tell that I receive such complaints, [they] always say [they] will meet the herder."

ON THE RADAR

In any exploration or mining project it is not unusual to encounter a range of views among local stakeholders, not all of whom may be supportive of a mine being developed in the region where they live. Concerns specific to Erdene and the Bayan Khundii project were raised by a small number of local stakeholders within the soums or aimag. These issues are summarized in Table 7. No company-specific concerns were raised during interviews conducted in Ulaanbaatar or in Canada.

At the soum level, senior officials in both Shinejinst and Bayan-Undur are aware of how to bring issues to Erdene's attention. This knowledge of the process for raising complaints and the willingness to draw issues to the attention of the company are critical to advancing the project with local support.

It is noted that Erdene is not the only exploration or mining company operating in the region. Since Erdene has developed an open channel for communication, there may be instances where local stakeholders bring forward complaints that arise from the work of other companies in the region.

It is also important to flag that there can be a gap between stakeholder perceptions of exploration and mining and what company personnel believe is science-based evidence to the contrary. However, stakeholder perceptions are based on their own reality and merit attention and consideration.

Topic	Issues raised
Water scarcity	There is a perception on the part of some stakeholders in the Gobi Desert that water in the region is connected underground and that water from one well used for exploration or mining will mean less water in other wells for herders.
Water quality	Concerns were raised that water quality seems to be deteriorating, with some reports that the water has a chalky colour and that herds are getting sick. It was suggested that water testing is needed to establish a water quality benchmark for future monitoring.
Dust/Roads	Large trucks and drill rigs used by exploration and mining were identified as being responsible for creating dust that is harmful to herd health. Mining and exploration companies were criticized for not employing effective dust suppression measures.
Working outside exploration license and permit areas	Comments were made that some exploration and mining companies and their contractors work outside their permit area, adversely impacting the environment and creating demand on water wells traditionally used by herders.
Pastureland erosion/desertification/soil vulnerability/plant damage	Concerns were raised about exploration and mining companies digging holes that are a hazard for herds, creating new roads in the desert that erode the pastureland and destroy plants, not completing reclamation work.
Misrepresentation	Companies earning a reputation for responsible mining may have their company name misappropriated by those acting in an irresponsible manner. This creates a perception that erodes the otherwise positive reputation of companies such as Erdene.

Table 7: Local issues of concern raised during interviews conducted in Shinejinst and Bayan-Undur soums.

VIEWS OF COMMUNITY ENGAGEMENT

All respondents were asked about what sort of relationship exploration companies should have with the communities that are closest to the areas where mineral exploration is taking place. Many respondents acknowledged - or in some cases commended - Erdene for following certain good practices, summarized below. For example, the company's scholarship program is widely recognized and appreciated; it was raised as an unprompted example of a positive community investment by 30% of interviewees. Respondents' views on the generic attributes of successful company-community engagement are classified below into four categories, each with accompanying qualifications and illustrative excerpts from interviews.

VISION

- Understand the local context.

"Needs are very different from one community to the next. I think it is very important to understand what the needs are and offer as much support as you reasonably can."

- Integrate the company message from market to neighbour.

"There is a lot of mistrust in communities where people feel companies are hiding the value of the exploration project . . . you have exploration companies wanting to let their investors know really good news stories: 'this has the potential of being worth millions of dollars'. And then they turn to the community and say, look we haven't got anything yet, so we are not going to commit to anything. People aren't stupid. They can see what is being said elsewhere. And when those two things don't match up that creates distrust."

STRATEGY

- Start engagement early using a planned and systematic approach. This gives people time to reflect and prepare for the proposed project and associated changes.

"I think the key is to plan their engagement before they engage and really understand what messages they want to give at various levels. And that should be integrated between how [companies] talk to international markets and how they talk to their neighbours on the ground. [Companies] should have a clear understanding of the strategies associated with those messages at every level."

- Engage with openness and honesty and embrace transparency.

"There will be many issues that are hard to resolve or that the company cannot resolve but in all situations, transparency is important. If someone tries to extort you, it is much better to be transparent. If there is a company line where all requests from the company must be received that will help to reduce ad hoc, discretionary requests from some powerful people. If your procurement is fully transparent, a process of selecting partners is clear, any back deals will backfire."

ERDENE'S COMMUNITY ENGAGEMENT

"Erdene shows significant contribution to the local development. . . They allocate money to specific programs and projects, like education, scholarship, health and other programs."

"They understand our local governments' challenges and where we need help."

"In our soum, we have many exploration licenses but there isn't any company that provides assistance to the local community other than Erdene."

"Erdene dug water wells for Bayan-Undur and Shinejinst. They also make scholarships for the community's children. They did small project grants in the Zuunmod oasis and the aimag center. They contributed to building the aimag's Mazaalai Park. So I believe that they are responsible in their duties."

RELATIONSHIPS

- Build relationships, not transactions. Consider all stakeholder groups and maintain ongoing dialogue, even in times of inactivity or low activity.

“There can be some mutual cooperation or agreement – it can be training, education. But to me you listen, then engage, then maybe build some sort of collaborative partnership.”

“The best thing a company can do is focus early and often on relationships. Sounds maybe cliché or generic. But what I mean is that listening is the primary work. Not talking. But listening.”

“Erdene is not just active in the province but also at the national level. Together with the national mining association they organized the Discover Mongolia Conference... So, don’t just be active in the community, but also at the national level.”

PEOPLE

- Ensure that benefits from exploration and mining projects accrue to all citizens rather than just to a small number of elites. Provide support to company people with responsibility for community engagement to help build successful community relations programs and relationships.

“It is important for the community members to know and be assured that the decisions and discussions were made in a group settings rather than one on one talks.”

“If the community even gets a chance to participate they are lucky. Usually it is the governor and a very small group of people close to him who benefit. Traditionally, they got bribes, money for their signature. The mining companies primarily talk to the governor and his buddies, and they gave them what they wanted to get the signatures. So if the community gets a chance to say, “Hey can we have this and that?” Then that is already a better case.”

“Erdene has professionals working for them who are knowledgeable. Many exploration companies wouldn’t have dedicated social and environmental resources.”

SUSTAINABLE DEVELOPMENT - COLLABORATIVE PARTNERSHIPS

As part of the data analysis, the five thematic areas of stakeholder interest/concern (described in Table 4) were mapped against the UN Sustainable Development Goals (SDGs). The 17 SDGs were announced in September 2015 and represent an agenda for addressing some of the world's most pressing issues. More than 190 national governments, including Mongolia, are signatories to the SDGs³. In addition, in Mongolia, the government has developed its own national Sustainable Development Vision 2030 (Government of Mongolia, 2016). The local governments of Bayankhongor aimag, Bayan-Undur soum and Shinejinst soum respectively are developing local-level sustainable development plans to guide regional development in a manner that will support national and local policy objectives.

The interview findings suggest that local officials view mining as a potential driver of economic growth, employment, and improved natural resource management. However, they stress it must be done in a way that minimizes adverse effects on animal husbandry: the primary livelihood source for local residents.

Connecting local issues and opportunities to the SDGs helps to frame Erdene's community development contributions within the global development agenda. The research findings map most closely to six SDGs (4, 6, 7, 9, 13, and 17, shown in Figure 3). Some proposed ideas are aligned with Erdene's current community development focus areas of health, education, and water. Others (especially SDGs 7, 9, 13, and 17) are associated with work the company is currently undertaking or investigating, such as assessment of renewable energy integration at the future mine site. This analysis reveals clear points of intersection between the interests of government, individual community priorities and the company — and may represent areas for future collaboration.



Figure 3 - Specific SDGs that align with Erdene and community priorities.

³ (<https://www.un.org/sustainabledevelopment/sustainable-development-goal>)

CREATING AND SHARING VALUE

The research set out to assess the ways in which exploration companies could create and share value with neighbouring communities. The term “creating shared value” is defined as an economic strategy that seeks the points of intersection between business and society to address macro-economic issues and drive outcomes that benefit business and society simultaneously (Porter & Kramer, 2011). “Creating shared value” means different things to different people. Yet as can be seen from the interview excerpts, respondents’ definitions of the term include reference to some form of mutual interest, with the majority indicating the concept had relevance for the Mongolian mining sector.

“When you are building a mine, it is not just the company. It is also the local government. Everyone should be getting value because that’s what natural resources are – a shared resource.”

Although one respondent claimed that “small companies cannot [create shared value]”, this research suggests that Erdene has been successful in creating and sharing value. Specific examples where Erdene has been perceived to have created and shared value include:

- Scholarship program for graduates of the local soum schools,
- Water initiatives, such as
 - Drilling new herder wells,
 - Identifying and drilling the first potable water well in Shinejinst soum centre, and
 - Rehabilitating existing herder wells that had fallen into disrepair.

Many of the topic areas identified in the research as areas for potential company-community collaboration align to specific SDGs. It is suggested that achieving the ambitious agenda of the UN SDGs will require business strategy and that the creating shared value approach offers companies such a strategy. Furthermore building collaborative partnerships – a key feature of creating shared value – provides the opportunity for mining companies to help governments achieve key policy objectives set out in national, regional and local level sustainable development plans. For companies, aligning stakeholder engagement with the SDGs may help effectively advance projects within the scope of both local policy objectives and the global development agenda.

“If Erdene wants it could be the first company in Mongolia to have a sustainable development strategy integrated to the SDGs.”

CREATING SHARED VALUE

“To me that means any mine development has to benefit not just the company that puts up the money to develop the mine but also the local community.”

“Creating shared value for me means that all stakeholders benefit to the maximum.”

“Potentially [creating shared value] means...aligning the interests of the local people with those of the company.”

“What it means to me is preserving your business value, making sure you operate your project, create a profit for your shareholders, your Board, your employees but also leaving a positive impact on local communities.”

“In Mongolia [one reason] why we as a society have a negative perception [of mining] is that in the past we have not built shared value. Only companies benefitted from the projects and mining.”

“I think the shared value thing is when communities have a stake in the risk or reward that occurs with extractives.”

Priority Issues			
SDG	Community interviews: Aimag, soum, herders	Company interviews: Employees, senior management, BOD	Potential shared interests
	Key issue	Key issue	
6: Clean water & sanitation 9: Industry, innovation & infrastructure	Water	Water	<ul style="list-style-type: none"> Water quantity Water quality/testing Competition for a scarce resource Impact of water withdrawals on aquifers Access to drinking water Drilling/maintaining water wells
15: Life on Land	Environment protection	Environmental management	<ul style="list-style-type: none"> Mitigating soil erosion/desertification Reclamation of exploration/mining sites Addressing impacts of climate change (drought, lack of precipitation, harsh winters, soil erosion) Pastureland availability/quality
1: No poverty	Employment	Local hiring and training	<ul style="list-style-type: none"> Local job opportunities Opportunities for local young people with education but without jobs
8: Decent work & economic growth	Economic development	Local procurement; community investment	<ul style="list-style-type: none"> Development of cashmere processing Opportunities for SME to supply exploration and mining Economic prosperity for the local soums Creating and sharing value Herd health
4: Quality education	Education	Scholarships; training	<ul style="list-style-type: none"> Repositioning Shinejinst school as an "eco school" Hiring a professional foreign language teacher Scholarships
7: Affordable & clean energy 9: Industry, innovation & infrastructure	Sustainable development	Sustainable development	<ul style="list-style-type: none"> Economic benefits Renewable energy Reclamation Closure planning Shared infrastructure

Table 7: Priority issues raised by community and company interview respondents showing potential points of intersection

ASSESSMENT

The extractive industry - operating within a free-market orientation - is relatively new in Mongolia. This limited experience of mining, related activities, and private, non-state mining entities has contributed to misunderstandings and distrust of the industry by local community members. As is the case in many other jurisdictions in the world⁴, mining in Mongolia suffers from a negative reputation (IRIM 2013). Public perception of the benefits of mining in Mongolia remain low despite the value society receives from the metals and materials that mining produces. There are also concerns - raised by interviewees and within the literature - about the ways in which mining is contributing to changes to the traditional cultural identity in Mongolia (e.g. Meesters & Behagel 2017; Ganbold & Ali, 2017). Allegations of corruption⁵ have contributed to a sense of unease within the international business community. Volatility within the legislative agenda and questions about governance within Mongolia have further dampened investor sentiment. Taken together, these factors mean that Erdene will confront many preconceived notions about mining, regardless of the company's own history and approach.

This research indicates Erdene has built a good foundation of relationships and experience with a broad range of stakeholders. The findings suggest there is an opportunity to position Erdene as a catalyst for sustainable development by continuing and extending those relationships. There are two benefits to this strategy. First, Erdene is in a position where it has earned sufficient trust with key stakeholder groups to leverage its early social responsibility investments to design and implement future actions that deliver both business and community value. Second, these efforts may help to demonstrate to investors and potential mine development partners that the company has de-risked the project not only for technical risk but also for social risk. Securing a "social license to operate" is currently ranked globally as one of the mining sector's largest challenges (PWC 2018, E&Y 2018). Exploration companies that are able to demonstrate they have built solid stakeholder relationships and collaborative partnerships should be able to quantify a return on social investment - for example, no lost days of production due to protests or securing the water supply required for production. Taken together with geological and market fundamentals, social support and impact could make projects more attractive to communities and mine development partners alike.

Erdene was recognized consistently by the interview sample for its commitment to community engagement. Almost all interviewees viewed Erdene more positively than other companies of which they were aware. A few people did not feel able to compare the company to others, but no respondent expressed negative views of Erdene explicitly.

⁴ See Globescan 2014 and ICMM 2015 for further information on trust and conflict.

⁵ See, for example, the 2018 media coverage of corruption allegations involving Mongolian government officials and Oyu Tolgoi.

It was noted by a number of interviewees – both those working within the industry and others – that community investment can create unrealistic expectations within local communities, in some cases making it challenging for the companies to manage expectations.

“They (a local community) may see a neighboring soum that has a mine and has a new hospital, new schools, and water supply. They think, you are here, why haven’t we got the same?”

“When Rio Tinto started managing the [Oyu Tolgoi] project they were faced with a strong demand that there should be a road, schools, hospitals etc. So, they (local community) had big expectations.”

“Herders became very dependent on Oyu Tolgoi. They had high expectations of Oyu Tolgoi”.

Erdene’s approach is recognized as being cautious and appropriate for the stage of its current projects (i.e. advanced exploration). However, the tendency of stakeholders to associate Erdene’s projects with Oyu Tolgoi, one of the world’s largest mines and located in the adjacent province to Bayankhongor, may influence expectations. This creates a risk for Erdene, and its smaller Bayan Khundii project that is unlikely to be able to deliver benefits comparable with a much larger mine at the scale of Oyu Tolgoi. Regular dialogue, consultation, outreach and targeted investments in creating and sharing value, much as Erdene has undertaken during the exploration stages of its projects, will be critical to managing the potentially high (perhaps at times unrealistic) expectations of local stakeholders.

It is clear from the interviews that some level of trust has been established. While the potential for challenges remains, the research findings suggest stakeholders will be willing to bring problems forward to the company for consideration. In many instances within the global mining sector, stakeholders talk only amongst themselves, something that creates the risk of polarized opposition.

“Trust can be pretty fragile at times and once it is broken it can cause you problems. But on the flip side if relationships are good and you are very participatory and ensure communities have a voice and you are listening to them it may shield you from some of the bumps during the mining or exploration stage of the project.”

The highest stakeholder risk identified is linked to water, specifically water quality and quantity, as well as other potential land use changes in the Gobi. These are not Erdene-specific issues: for example, water quality and quantity was raised repeatedly in the study IRIM did for the IFC assessing community perceptions in Umnugovi province towards access to water, use of water and opinions on water management. During this research, interviewees raised concerns about water—such as, “Is there enough water for everyone?” and “If Erdene finds water, will that mean the company will get water that might otherwise have been available for the herders?” Some people worry that drawing water from one underground aquifer will result in declining volumes in all aquifers that will not be replenished. Importantly, Bayankhongor communities have never been involved in the local development of any industrial scale mine operation through to full commissioning (although micro, private gold operations have taken place).

It is noted that herders appeared most concerned about water quality and quantity. While those interviewed acknowledged that Erdene has rehabilitated wells and, in some cases, drilled new wells, this effort may not necessarily offset their concerns about water availability for herds. This finding is not surprising given the harsh climatic conditions of recent years and lack of previous experience with industrial or urban water use.

Going forward, it will be important to continue to acknowledge the legitimacy of herders' concerns while pursuing further opportunities for collaborative partnerships to address water quality and supply issues. Further awareness of the potential benefits that a world-class mining operation could generate in the region is needed. In short, companies should listen closely and communicate often with regional stakeholders.

The research suggests there is a high degree of awareness across all levels of the company (from front line employees, to senior management and the Board of Directors) of the importance of stakeholder engagement.

“When our people go out in the field in Mongolia and we’re dealing with nomadic herders who have lived that life for thousands of years, you have to respect it.”

Non-company, community-based stakeholders view a small number of specific individuals as their primary contacts. This has both positive and negative implications. On the one hand, it streamlines communication, ensures consistent messaging and builds trust in individual relationships. Conversely, it can create vulnerability and dependence on a small set of individuals, a risk to Erdene's operations that is exacerbated by the nomadic, individualistic culture common in rural Mongolia. As the company grows, it will be important to continue to build relationships across relevant aspects of the company's operations to distribute social capital broadly through the Erdene organization. It is noted that Erdene is commended by industry stakeholders for the fact that the company has dedicated human resources to community relations at the early stage of their projects and that the company has appointed a health and safety officer and an environmental officer who undertake stakeholder engagement in the field. This is expected to support efforts to continue to build company awareness in Bayankhongor. As the project advances, there may also be value in providing training for staff to develop their community relations and engagement skills. A frequent complaint from geologists and mining engineers working for other companies is that they are increasingly required to liaise with community-based stakeholders yet are not provided training to equip them with the skills to be successful.

Erdene's decision to cross-list company shares on the Mongolian Stock Exchange, and to then enable the purchase and registration of shares for residents of the two soums closest to the Bayan Khundii project, was noted by many community-based interview respondents as an example of a tangible benefit the company was providing to local residents. A number of interviewees in local communities identified the share offering as an example of creating shared value.

In summary, the research concludes that exploration companies can be positioned to create and share value for the communities in which they operate. Erdene emerges as a leading practice case, with the company's success attributed to four key factors:

- 1. Vision:** A clear vision on the importance of stakeholder engagement and sustainable development that is set from the top of the company. It is clearly articulated and subsequently embraced by employees at all levels of the company. Maintaining this vision in a company the size of Erdene is commendable. This vision needs to be safeguarded and reinforced as the company grows to reflect the increased personnel requirements of mine development.
 - 2. Relationships:** The willingness to engage early and to invest time to build relationships, as opposed to more transactional engagement. Erdene's commitment is demonstrated – and recognized by stakeholders – by its long-term presence in Mongolia, and by its efforts to build healthy, resilient relationships at national and local levels, as well as with international investors.
 - 3. Strategy:** A strategic approach to the design and execution of a community relations program that delivers tangible benefits and is proportional to the company's resources and to the stage of a given project within the mine life cycle.
 - 4. People:** The investment in personnel to support effective community engagement is recognized as a cost to the company that differentiates Erdene positively from other exploration companies.
-

RECOMMENDATIONS

Recommendations from the research are grouped into two areas: 1) business strategy, and 2) communications.

BUSINESS STRATEGY

The research suggests that Erdene has a progressive view on social responsibility and that the company's vision for sustainable development is embedded within the company. Senior management, Board members and front-line employees all express a common view on the importance of effective, meaningful stakeholder engagement.

Given the current level of awareness of Erdene and its reputation within the aimag and soums closest to its projects (as a company that can be trusted to make a contribution to regional interests), Erdene appears to have the opportunity to solidify positive social impacts as it seeks to develop the Bayan Khundii and Altan Nar projects.

To ensure that company activities continue creating and sharing value for all stakeholders, the company may consider the following three initiatives:

- [Develop a strategy embedding requirements for engagement, sustainable development, and creating shared value within corporate policies.](#)

The purpose of the proposed strategy would be to safeguard what is referred to academically as a "social chain of custody". This is an emerging area of practice that considers how to build and maintain trust as a project advances from exploration through permitting and construction to operations and eventual closure.

Set at the senior management level of the company, and aligned with Erdene's overall business strategy, the outcome of the social chain of custody strategy would be to protect stakeholder relationships and the company's corporate reputation - its reputation capital - during the development, construction and closure of the Bayan Khundii and Altan Nar projects. Recognizing that few mines are developed and operated by those who discover the deposit, the "social chain of custody" strategy would outline the process for creating and sharing value and stakeholder engagement as company projects transition from exploration to mine development and operations and, eventually, closure. An important component of the strategy would be an outline of a process for securing a commitment from any future project partners that social responsibility and creating shared value remain business fundamentals.

Employees are recognized as a key stakeholder group within a social chain of custody strategy. Those who work at Erdene have the potential to become ambassadors in protecting company's reputational capital. To accomplish that objective, employees need to be provided with a clear picture of the company's evolving business strategy via clear and ongoing communications. As the corporate workforce grows in numbers, there may be a need to formalize a process for briefing employees on changes to company business strategy.

As social chain of custody is an emerging area in the mineral exploration CSR field, it is difficult to point to successful examples. However, the importance of reputation management for business success has been well documented (see for example Eccles, Newquist, & Schatz, 2007)

- **Increase the participation of local individuals and companies in the direct supply and value chain of the Bayan Khundii and Altan Nar projects**

Targeted and timely local content policies, particularly around workforce development, procurement and construction, are critical in reducing turnover, sharing benefits, and mitigating the social risk of a mining business. As the Bayan Khundii and Altan Nar projects advance, it is recommended that Erdene expand existing efforts to employ local individuals and contract with local companies. In addition to local mine procurement, Erdene could consider ways in which the company could support non-mining business development in the region. The research findings suggest the livestock industry (for example, helping herders to undertake more balanced grazing practices or adopting new practices to enhance herd health and wellness) and the environmental sector as two potential focus areas.

From the community-based interviews, there is significant interest in developing a range of value-added industries within Bayankhongor. Some value-add initiatives may create points of intersection between Erdene's needs and those of regional stakeholders. For example, renewable energy integration to reduce greenhouse gas emissions and increase energy security, and water infrastructure to provide settlements with potable water. It is noted that both energy and water are areas where Erdene has already begun building relationships and investigating opportunities.

Exploring opportunities and allocating resources for knowledge transfer and capacity building is proposed as an effective means to continue building the company's reputation capital into the mine development stage and beyond, especially in the areas of mining, mine supply, and other non-related businesses (such as tourism).

Some value-add initiatives – for example within the cashmere industry (i.e. washing and de-hairing) - may not offer shared value opportunities for the company directly, but could be a way to enhance the primary source of income for local families and therefore be worthy projects to support.

Areas where company expertise could be used to support local value-add could include facilitating (or sponsoring) technical assistance to help local herders to develop a business or marketing plan for cashmere of various quality, or to support herders wishing to form a co-op to meet requirements for the provision of meat to the exploration and/or mining camp. Reclamation was another topic raised frequently by interview respondents as an area needing attention – both reclaiming sites abandoned by micro miners and sites used for exploration where permit holders have not met their reclamation requirements. This therefore represents one business development opportunity for consideration at some future point (when permit holder liabilities are more fully enforced).

Another, complementary, approach would be for Erdene to work with its contractors to have these companies contribute to Erdene's strategy to create shared value locally. Identifying specific opportunities would require discussions with contractors to assess options. One area to explore might be the use of back haul routes at competitive pricing (for trucks that bring provisions to the mine site and return to Ulaanbaatar empty) to provide transport for local businesses seeking to develop markets in the aimag centre and Ulaanbaatar. This could be a significant cost savings for local start-up businesses that could be delivered with little to no financial cost to transport providers.

- Continued investment in the company's water management systems and stewardship efforts

With water raised as a critical issue by all stakeholders, it will be important for Erdene to continue to demonstrate that it will be a responsible water steward. In addition to the company's efforts with communities and stakeholders in Bayankhongor, ongoing participation in the water roundtable and International Finance Corporation's Voluntary Code of Practice⁶, is expected to be valuable for Erdene.

It is important to recognize that perceptions of water quality and quantity are difficult to offset with facts and science: people need first-hand experience. Setting up a participatory water monitoring committee that includes herders, as well as representatives of the baghs and soums in the region, is recommended as a strategy to create awareness and reduce social risk. The roles and responsibilities of a monitoring committee could grow with the project: i.e. starting small, perhaps with tours to the wells, and advancing to a more comprehensive approach to testing and monitoring water.

⁶ <https://www.commdev.org/south-gobi-water-and-mining-industry-roundtable/>

COMMUNICATIONS

- Continue to enhance stakeholder knowledge of the industry.

As large-scale mining would be a new activity within local communities, there is a need to educate stakeholders about the stages of mineral exploration and mining; environmental protection measures; and the potential for benefits from mining investment to support the region's own sustainability agenda, as well as national policy objectives.

"They have to educate local people on what exploration is and why it is important. We know that we do not have very good geological information at the national level. All these experts know. At the local level, they do not know and do not have mining education. . . They always think they are gaining a lot of profit from exploration projects."

Erdene is recognized for the good work company representatives have done initiating relationships and supporting community projects. To extend the benefits of stakeholder engagement, Erdene could explore ways to deliver additional project information to stakeholders in Mongolian. A recent study conducted by Sant Maral (2017) suggests that 52 percent of countryside residents and 69 percent of Ulaanbaatar residents are Facebook users. Erdene could therefore use digital platforms, such as Facebook, as a communications tool: setting up a Mongolian language page to inform local residents about current activities and a proposed timeline for mine development. This platform could also be used to share – or link to – public education materials developed by third party groups on topics of local interest.

Community meetings and household visits help to build trust that the company is transparent and is providing benefits to all, rather than just to elites. This may help mitigate against a negative perception that can develop if one-to-one meetings with local leadership are the exclusive form of community conversation. Rather than organizing traditional town hall meetings, Erdene could explore other engagement tactics, such as community open house information sessions that introduce key topics beyond mining that could help empower communities (such as capital markets information or transportation planning). Working collaboratively with the local co-operation committees to create a forum for an annual community reporting session might be one way to avoid the polarized dynamics that can result when town hall-type sessions are offered.

- Grievance process

While there is a high degree of recognition that problems can be brought to the attention of Erdene's designated personnel, local residents are less aware of Erdene's formal grievance process. While recognizing that Mongolian culture relies upon oral tradition, documenting community concerns and action taken to address those issues provides an important record for the company and for future investment partners. There are sophisticated software programs⁷ to support this type of documentation. However, at the current stage of project development existing protocols are likely sufficient. As projects advance, many companies find there is an increase in complaints and concerns. For example, a study done in 2014 highlighted that the largest number of conflicts occur at the development stage of mines (Davis & Franks, 2014). For this reason it is recommended that Erdene undertake an annual review of grievances to gauge the ongoing relevance of the existing grievance management process.

⁷ See for example <https://www.sustainet.com/stakeholder-management-software/> and <https://www.boreal-is.com/blog/grievance-management-mechanisms-en-system/>

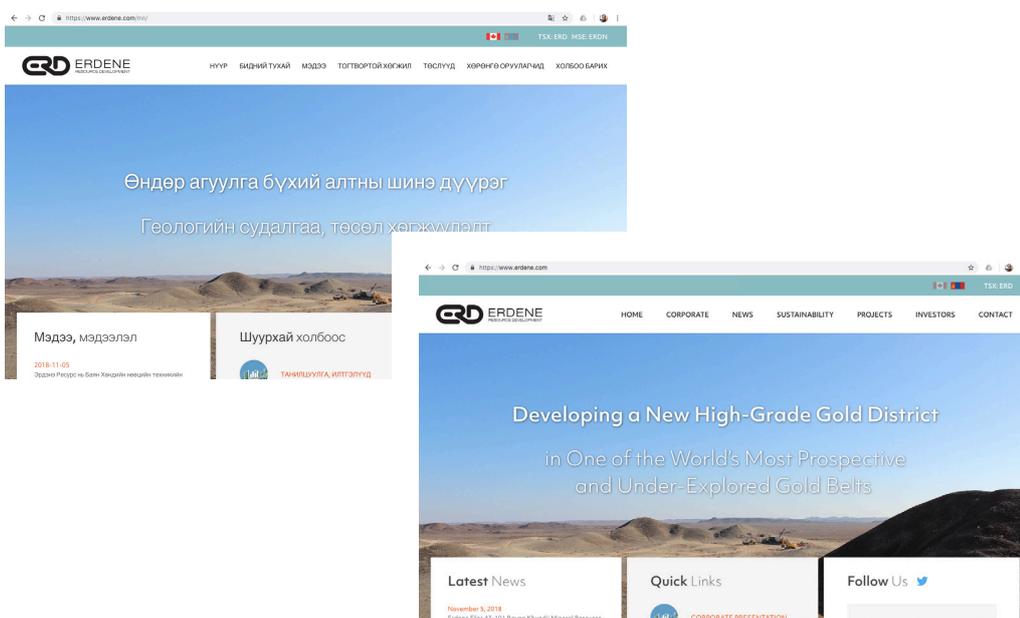
- Develop a community page on the corporate website

Erdene's new website launched in 2018 contains detailed information for shareholders, investors, permitting agencies and regulators in both English and Mongolian. Yet, it is lacking a section with information prepared specifically for community stakeholders. Some companies choose to set up separate project websites that are linked to the corporate site. Others create a section on the corporate site.

The transition from exploration to construction is the most common time for companies to establish stand-alone/project websites. Such sites typically complement other digital platforms, such as Twitter and Facebook, while providing the company with greater control over the content. Websites are a common communications platform and a place where many stakeholders look for company-specific information.

Regardless of whether the decision is to build additional community pages on the corporate website or to build a project site, the information will be most effective if presented in Mongolian and written in simple non-technical language (for example, to a Grade 6 reading level). Content could include:

- Photos/videos from community sponsored projects;
- Interviews with those who received community funding;
- Interactive maps showing the location of rehabilitated water wells or new wells drilled by the company;
- Links to public education materials prepared by third parties, such as the IFC, NGO partners, development agencies, and/or mining associations.
- Graphics explaining the life cycle of mining projects; the types of jobs that exploration and mining create with the associated skills required so interested parties can plan for a career in the industry,
- Detail on sustainability initiatives,
- Minutes from meetings of the local co-operation committee or community information sessions,
- Applications for community investment funding,
- And/or information on how to get involved in initiatives such as participatory water monitoring programs.



FUTURE RESEARCH FOR ERDENE AND THE INDUSTRY

From an academic perspective, further research is needed to explore the hierarchy of social responsibility. It is recognized that many community engagement programs start with philanthropy and we argue that this is an important step in building relationships and trust. As those relationships are strengthened, there is an opportunity to move to more strategic forms of social responsibility and, ultimately, to employ Porter and Kramer's shared value concept as a strategy to advance progress on the UN Sustainable Development Goals. While it can be challenging for exploration companies to build and fund the sorts of collaborative partnerships that constitute "creating shared value" over the long term, findings from the Erdene research suggest there is an intermediary step. This step is more strategic than traditional corporate social responsibility (CSR) and creates opportunities to begin to work on issues of mutual interest, to enhance stakeholder engagement, to build reputation capital, add value, and decrease social risk. Continuing to follow Erdene as the company advances the Bayan Khundii and Altan Nar projects would also give academic researchers a unique perspective on how companies build and protect their social chain of custody during life of mine operational and associated organizational changes.

FOR MORE INFORMATION

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APPENDIX A: ERDENE CASE STUDY RESEARCH QUALITATIVE INTERVIEW GUIDE

The University of British Columbia is undertaking a research project on applied approaches to corporate social responsibility and the implementation of the United Nations Sustainable Development Goals in the global mining sector. Of specific interest, is the question of how junior mineral exploration companies, working towards mine development, might create and share value to maximize benefits for host communities and governments as well as the company. There are no right or wrong answers and if there are questions you would prefer not to answer, just let us know and we can skip ahead.

1. What do you think is the most important issue facing your (insert one - community/ company/ industry) today?
2. In what ways do you feel that pre-mining mineral exploration can impact a) you, b) your community, c) your country? (Probe to determine positive, negative, neutral, impacts that can or cannot be avoided or compensated)
3. Can you tell me a little about your experience with mineral exploration and mining?
4. What sort of relationship should exploration companies have with the communities that are closest to the areas where mineral exploration is taking place? Can you give me an example? Does the relationship change once a mine is in development? If so, can you tell me how?
5. There is talk within the mining industry of the importance of companies creating and sharing value to support sustainable development. What do you think about this idea of creating and sharing value in the mining sector. . . what does it mean to you?

Part 2: Erdene Specific

6. I would like to ask you a few questions about Erdene (Mongolia - Erdene Mongol LLC; elsewhere Erdene Resource Development Corporation). Have you heard of the company Erdene? If yes, proceed, if not move to Q10
How does Erdene compare to other exploration companies that you are aware of:
 Not familiar with any other companies
 About the same
 Erdene is better.
In what way?
 Erdene is worse
Why do you say that?
 7. How would you describe your impression of Erdene?
 Very favourable
 Somewhat favourable
 No opinion
 Somewhat unfavourable
 Very unfavourable
Why do you say that?
-

8. Please tell us if you agree or disagree with the following statements

	Agree	No Opinion	Disagree
Erdene operates in an environmentally sound manner	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Erdene communicates effectively within your community	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
The project is managed by people you can trust	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
The company is responsive to community concerns	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Erdene keeps promises made to the community	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Erdene finding a mineable deposit would benefit the community	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

9. Are you aware of any community projects Erdene has sponsored?
a. If yes, can you tell me a little about that/those projects?

No Yes

SDGs

10. In addition to traditional community investments and sponsorships, some communities are now looking to mining to support their region's sustainable development. In some places this has led to innovative partnerships on projects such as clean energy initiatives, water management, or shared infrastructure. Are there any projects in your community where mining might be able to play a role as a partner in that sort of collaborative undertaking?

Concluding Questions

11. Erdene is working to determine if a gold mine – called Banyan Khundii – could be developed. Do you have any concerns about the potential Banyan Khundii gold mine that Erdene is hoping to develop?

12. Anything else you would like to add?

Thank you. Your views and opinions have been very helpful, and we appreciate you taking the time to talk with us.
