Do You Need a CEMP? How Your Community and Your Company Can Design and Implement a Community Environmental Monitoring Program

By Peter Plastrik

May 2013

Peter Plastrik is a writer, consultant, and vice president of the Innovation Network for Communities. Co-author of *Banishing Bureaucracy* and *The Reinventor's Fieldbook*, he has written extensively about community-based innovations. This case study was jointly commissioned by Rio Tinto Group and the Superior Watershed Partnership.





Introduction

In 2012 we unexpectedly started a journey together that led to the creation of a Community Environmental Monitoring Program (CEMP). We had very different starting points and purposes. We had very different backgrounds. Picture it: A long-time community-based environmentalist and a global mining company official. But we agreed on one thing: We wanted to find a way to empower the communities of Marquette County, Michigan—some 64,000 people—to understand and monitor a new mining operation's environmental impacts, going beyond any checking the company or governments had ordered. So we decided to have our organizations work together to try to find a way.

We took the journey's tentative first steps with little clarity about where we'd go next and no certainty of success. No one had a handy, off-the-shelf solution. We got others involved. We negotiated. We invented. And we finally came up with an agreement, the CEMP, of which we're quite proud and that's being implemented. We couldn't have done it without each other.

Now we're inviting you to learn about this innovation—what it is and does, how it might apply to your community or company, and how to do it yourself. A CEMP agreement can help to guard the environment from damage. It can help reduce the stress in a community seemingly faced with choosing between economic development and environmental protection. And it can enhance a company's efforts to earn the trust and support of the community. In this how-to booklet, authored by Peter Plastrik at our request, we offer step-by-step guidance for creating other CEMPs, adapted to fit your own needs and situation. The fact that we share a single voice in describing this to you, in spite of our differences, is something we could not have imagined when this journey started. It's also evidence that something new and different has happened, with exciting potential.

Simon Nish Director of Communities, Communications and External Relations Rio Tinto Eagle Mine Carl Lindquist
Executive Director
Superior Watershed Partnership

Contents

Part I: Orientation	Page 4
 1.1 Every Solution Starts with a Problem 1.2 Origin of the CEMP 1.3 The CEMP At Work 1.4 What Is a Community Environmental Monitoring Program? 1.5 Benefits of a CEMP 1.6 The CEMP is a Model for Others to Use 	
Part II: Step-By-Step Guidance for Designing a CEMP	Page 7
 2.1 Find Potential Partners 2.2 Build Trust 2.3 Identify Shared Goals for a CEMP 2.4 Identify Key Design Principles for a CEMP 2.5 Design Implementation Mechanisms 	
Part III: Implementation Mechanisms in the CEMP	Page 11
 3.2 The Written Agreement 3.3 CEMP Fund 3.4 CEMP Oversight Board 3.5 CEMP Annual Work plan 3.6 Data-Sharing and Monitoring Standards 3.7 Resolving Disagreements 3.8 SWP Community Outreach and Web Site 	
Part IV: Managing Initial Implementation	Page 16
4. 1 Organizing Operational Communications between the Parties4.2 Setting up the CEMP Board4.3 Bringing in the Public and the Press	
Part V: Resources: Where to Find Them	Page 18

PART I: ORIENTATION

1.1 Every Solution Starts with a Problem

This booklet describes a new way that communities and companies can solve an old problem they share.

The problem is the risk to the environment created by certain economic activities and the public's anxiety about how well those risks are being monitored and managed. Even after a company's economic-development project has met all legal and government regulatory requirements, its potential negative impact on environmental quality and human health, should something go wrong, may distress people in the area. They simply may not trust the company to "do it right," because of the local history, the company's track record, or their suspicions about the company's motivations. They may not trust government officials to stay on top of what's happening at the development site, to blow the whistle if something is wrong, or to prevent a disaster from happening in the first place.

This sort of problem typically causes serious pain in a community. Many of its members divide into opposing camps: pro- and anti-development, pro-environment versus pro-economy. The battles can become fierce, personal, and endless—and spill over into other matters. Anxieties about the project's potential impact endure, further adding to community stress. Instead of the company's presence—its project, employees, contractors, everything about it—being a contribution to the community's well-being, it becomes a source of conflict within the community.

The company also suffers. The problem costs the company money and ill-will in the community, because it must fend off endless attacks and even lawsuits. Literally anything that happens at the project site, no matter how minor, can become a point of contention in the community and cause delay in the project. In some cases, determined community members may start their own ad hoc "monitoring" of the site, generating data that may or may not be valid but is sure to inflame community concerns. All of this can damage the company's reputation in other communities where it wants to operate and with customers in its markets.

Anyone who has been through something like this knows how destructive it can be—and how hard it is to address. When community members don't trust the company and government regulators, who would they trust? When a company has complied with all legal and regulatory requirements, why should it go through additional effort and, yes, the cost of doing something to make the community feel better? What can really be done to reassure the community? Who would the company trust to do it?

1.2 Origin of the CEMP

The problem was in full bloom in Marquette County, Michigan in early 2012. A new nickel-copper mine was being constructed by a London-based corporation. The Rio Tinto Group had secured all necessary permits from state and federal government agencies. The mine was being built, hundreds of local contractors and employees were on the payroll, more than \$30 million had been spent to build a state-of-the-art water treatment plant, and the company expected to spend at least \$225 million on the site before generating any revenue.

But the community was disturbed. The mine site was located at the headwaters of a wild river that emptied into Lake Superior and contained a rare species of trout. Fear of the unknown and the unexplained; distrust of a corporation's motives and deep pockets; lack of faith in distant state and federal government regulators; and a dismaying sense of powerlessness in the face of apparent threats to the environment and health: as these feelings surged through the community, some began advocating for independent monitoring of the mine's environmental impacts.

The company concluded it had to find a way to build public confidence and trust in its operations. So in the spring of 2012 it decided to try a new approach, something it hadn't tried anywhere before. (For a detailed article about the process that led to the CEMP, see http://www.cempmonitoring.com/wp-content/themes/cemp/pdfs/RT CEMP-The-Unity-of-Place.pdf).

1.3 The CEMP At Work

Fast forward about six months. It's the end of 2012; as winter descended on northern Michigan, staff members of the Superior Watershed Partnership, a regional conservation nonprofit, monitored the water and air quality at and around the new Eagle Mine, still under construction. They took water samples from the mine's water treatment plant, surface facilities, and groundwater monitoring wells, and sent them to a laboratory for testing. They set up a permanent air quality monitoring station west of Big Bay, the nearest town to the mine. They used hand-held devices to monitor the air quality around the mine. They assessed the mine's monitoring and data collection procedures to assure they will generate data representative of mine-site conditions. And they pored over the mine company's own environmental monitoring data and operations data, to check on its validity and the company's interpretation of what the data meant.

All of the Superior Watershed Partnership's monitoring was being done at its own discretion—it could even act on suggestions from the public—and went beyond what government permits required of the Eagle Mine operation. But it wasn't a secret or off-the-cuff operation. The mine owner, Rio Tinto, the world's second largest mining company, had agreed to give the Superior Watershed Partnership an independent hand in environmental monitoring, as long as it met scientific standards. Superior Watershed Partnership staff had complete access to the mine site, as well as its records.

This arrangement will continue for at least three years and could be renewed through the life of the mine. Under the agreement, the Superior Watershed Partnership will make public all of the results of its monitoring and checking and auditing of mine data as quickly as possible on its Web site. This, too, was agreed to by Rio Tinto.

All of the Superior Watershed Partnership's monitoring work is to be paid for by the company through its donations to the Marquette County Community Foundation, a fiscal-agent arrangement that ensures the Superior Watershed Partnership's independence from company influence. Other donors can add funding to provide for additional monitoring by the Superior Watershed Partnership.

Every bit of this—the scope and standards for monitoring that go beyond government requirements; the full and timely public disclosure of data; the funding from the company, above what it already will spend on environmental monitoring; and, most important, the Superior Watershed Partnership's independence to scrutinize the company's operation—was not just agreed

to by Rio Tinto. The corporation had invited and embraced it. Indeed, it was Rio Tinto that initiated the discussions, early in 2012, that led to a formal, detailed monitoring agreement, known as the Community Environmental Monitoring Program, or CEMP.

1.4 What Is a Community Environmental Monitoring Program?

A CEMP is a voluntary agreement between an economic-project developer and one or more community-based organizations that empowers members of the community to monitor at their discretion the project's environmental impacts, based on scientific standards, and ensures public access to all monitoring information in a timely and understandable manner.

The agreement is a legally binding document that details the consents, commitments, and mutual obligations of the parties to the agreement. It guarantees that the community entities will have the independence, permission, access to company data, property, and personnel, as well as financial resources they need to determine and conduct monitoring. And it obligates the community entity to communicate to the public its monitoring findings.

All parties agree on what is to be accomplished under the pact: a program of independent environmental monitoring. The agreement controls the relationship between all of the parties. And

it sets up a neutral, independent community-based board with the authority to approve all plans and budgets, enforce the agreement and resolve any disputes between the parties. A CEMP creates an additional layer of monitoring; it doesn't add regulations or change the accountability of the project developer for environmental management.



The agreement also institutionalizes the relationship between the community and the project, which provides some assurance that independent monitoring will not be affected by personnel changes within the community entities or the project management.

In Marquette County, the CEMP—officially called the "Rio Tinto Eagle Mine Community Environmental Monitoring Program"—is an agreement between three parties: Rio Tinto Eagle Mine, the Superior Watershed Partnership, and the Marquette County Community Foundation, which serves as both fiscal agent for the agreement and as community-based umpire to rule on any disagreements the other parties may have about implementing the agreement.

Press conference launching the CEMP: (From left to right: Simon Nish, Director of Community, Communications and External Relations Mark Canale, Chairman of the Board, Marquette County Community Foundation; Jerry Maynard, Director of the Superior Watershed Partnership; Carl Lindquist, Executive Director of Superior Watershed Partnership.

1.5 Benefits of a CEMP

A Community Environmental Monitoring Program may produce three distinct and important types of benefits:

- **Help to guard the environment from damage.** This was the driving motivation for the Superior Watershed Partnership.
- Help the company to earn the community's trust and support for its operation. A company that allows independent monitoring of its environmental impacts may gain a measure of respect in a community that has been troubled. Earning community trust and reducing the risk of future litigation were certainly uppermost on Rio Tinto's mind.
- Help reduce the stress in a community faced with what it sees as the potential tradeoff between economic benefits and environmental quality. This mattered to the Marquette County Community Foundation when it stepped up to assist Rio Tinto and the Superior Watershed Partnership in implementing the CEMP.

1.6 The CEMP as a Model for Others

The CEMP is more than a unique arrangement between a global mining company and an environmental organization in Michigan's remote Upper Peninsula. It's a potential model that other communities and companies in mining and other sectors can use to provide greater assurance that potential environmental impacts of any sort will be detected, revealed, and addressed. And it can be used for any type of project for which the community has abiding environmental concerns—a new development, a redevelopment, or even an existing situation.

There is no "one size fits all" for a CEMP agreement; each has to be tailored to the needs and contexts of the parties. This booklet is intended to help you do that, whatever your starting point.

PART II: STEP-BY-STEP GUIDANCE

2.1 Find Potential Partners

When it comes to creating a CEMP, it takes at least two to tango. A company may be interested in realizing the benefits of a CEMP, but it needs partner organizations in the community that can perform the tasks involved in a CEMP. A community-based environmental or civic organization may see the need for additional monitoring of a specific economic project, but it needs the company that owns the project to be a willing partner.

Whether a company or a community organization starts the process, it has to identify and engage potential partners willing to explore the possibility of an agreement. Remember, though, that the decision to dance should be voluntary. **No party should be forced into working on a CEMP agreement.** Discussions about creating a CEMP can even occur before a company has the necessary green lights for a project.

When a Company Starts the Process

For a company there are two ways to identify potential partner organizations in the community. One is to do a private "scan" of potential organizations—researching and contacting them to sound them out—and then select from those that seem most promising. Another way is for the company to issue a public Request for Proposals (RFP) to find out which, if any, organizations would be interested in and have the capabilities for conducting a monitoring program.

An RFP process is a useful tool for finding out which entities in the community might be interested in working to develop a CEMP and it allows the company to be public about what it's planning and how it intends to engage with community entities. But an RFP can also be a fairly slow process. It may pit community entities against each other, which is unhelpful. And it may lead community members to develop expectations—positive or negative—about what the company is up to long before there's any clarity about what might actually occur.

Whether a company uses a public RFP or a private scan to identify potential partners for a CEMP, it has to be clear about what it's looking for in a partner. Among the desired characteristics are:

- Credibility within the community.
- Capacity to negotiate and implement a CEMP.
- A track record of environmental monitoring and communicating with the community.
- A level-headed, reliable board of directors and top management.

When a Community-Based Organization Starts the Process

For a community organization that wants to engage a company in developing a CEMP there are several important aspects to approaching the company:

- Be clear about what you want and how it might be done. Your organization can use the example of the CEMP in Marquette County, and this booklet, to describe what a CEMP customized to your situation might look like.
- Consider how strong your organization's credibility within the community and capacity to implement a CEMP are—and what might be done to strengthen them.
- Consider how open minded the organization is to mining, without a strong predetermined bias about resource development.
- If you don't already have a relationship with top management in the company, instead of
 making a "cold call" on the company, identify someone in the community who might
 approach the company on your behalf, vouch for your organization's seriousness and
 standing in the community, and set up a first meeting with the right people in the
 company.
- Understand and be able to describe the potential benefits to the company in setting up independent community monitoring.

2.2 Build Trust

The potential partners in a community environmental monitoring agreement must build enough trust between themselves so they can start to negotiate the details of a CEMP. In our experience, trust building involves at least three essential activities:

- Get to know each other as people.
- Clearly and candidly put your organization's motivations and "must haves" on the table.
- Build a relationship between the leaders of the community organization and company

Getting to Know Each Other

People get to know each other best by being with each other and doing things together. The negotiators for the Superior Watershed Partnership, Rio Tinto, and the Marquette County Community Foundation held frequent and long meetings, and side meetings, often over a meal. The Superior Watershed Partnership board of directors took a thorough visit to the mine site, which allowed it to assess the competencies and commitment of the mine's environmental managers. It also met with the mine president, Adam Burley, which gave it a chance to check on support for the CEMP higher up in the company.

Sharing Motivations and "Must Haves"

Each of the organizations that created the CEMP had different reasons for doing so. Being clear about each other's interests made it possible to look for areas of common ground. For instance, the Superior Watershed Partnership wanted to enhance environmental protection, while Rio Tinto wanted to build community trust in its environmental performance. SWP wanted to build a monitoring model that might be used elsewhere in the Great Lakes, while Rio Tinto wanted to create a model that would build its reputation for building new, modern mines. The convergence of these interests opened the door for designing a CEMP.

It matters at the outset to make clear to the other parties what your motivations are and what your "must haves," your bottom lines, are. This allows each party to decide if it's willing to try to craft an agreement that satisfies the other parties' objectives. And it allows each party to think creatively about what a solution must look like if it will respond to all parties' motivations.

2.3 Identify Shared Goals for a CEMP

The purpose of the CEMP, built right into the agreement is "to build a comprehensive and accurate picture of Eagle Mine's environmental impacts." Period. This is the *shared* goal agreed to by Rio Tinto, the Superior Watershed Partnership, and the Marquette County Community Foundation. This goal is not the same thing as the motivations that each party started with. It was by developing the *shared goal* of creating a comprehensive and accurate picture of the mine's environmental impacts that each party was able to achieve its own objective.

Although the CEMP covered *all* potential environmental impacts, that was a choice made by the parties. It's possible, instead, to focus on a particular type of environmental impact—groundwater quality, or air quality, or soil quality, for instance—depending on the type of development project underway and the concerns of the community.

2.4 Identify Key Design Principles for a CEMP

On the way to creating the CEMP, the negotiating parties agreed on a set of principles that had to be addressed in implementation. Some principles were more important to one party than another. Some were difficult to agree to, some were not. All of the principles were used to develop the CEMP's implementation mechanisms.

In all, six key principles are embedded in the CEMP, each one reflecting key questions that the parties in a CEMP negotiation will likely have to work through. The answers that the CEMP negotiators reached may provide guidance for others.

1. The agreement supports community participation in determining what will be monitored, but all monitoring must meet scientific standards.

The agreement adds community-determined monitoring to the monitoring required by government regulatory agencies granting the permit to operate. The community participates in determining monitoring in two ways: (a) through monitoring that the community-based monitoring entity (the Superior Watershed Partnership in the case of the CEMP) has embedded in the CEMP agreement with the consent of the other parties and (b) through additional suggestions made by community members, which the monitoring entity will consider for implementation.

However, any monitoring by the monitoring entity must meet scientific standards for monitoring as defined in the agreement. The CEMP embraces the "highest scientific standards" and this is further defined and illustrated. For instance, the agreement states that "the way that sampling and testing is done... must ensure that results can be easily compared with results from earlier samples and tests."

In the case of the CEMP the parties will use monitoring standards of the U.S. Environmental Protection Agency and the State of Michigan Department of Environmental Quality. And they will establish "baseline data," measurements of the current state of the environment—based on existing data or new data to be collected—against which future states can be compared. This baseline data must meet scientific standards.

2. The agreement ensures the independence of the community monitoring entity, both in fact and in perception by the community.

Nothing in the agreement may compromise the independence of the community-based organization conducting the monitoring, in fact or in the community's perception. The scope of monitoring—what and when to monitor—is solely up to the monitoring entity without restriction except—and this was crucial to Rio Tinto-the requirement to meet scientific standards in monitoring methodology. The Superior Watershed Partnership's independence was constrained, but not compromised, by the condition that all monitoring meet scientific standards; this established a balance between both parties' interests.

The CEMP assures that the Superior Watershed Partnership "will be independent in the way it runs the CEMP, although it must do so within the rules of the agreements and agreed monitoring standards." The Superior Watershed Partnership has "final say" on where monitoring data will be collected; which subcontractors will do monitoring work; which laboratories will do testing; how to approach additional monitoring; which baseline data will be used; and more.

A particular concern that had to be addressed in the CEMP negotiation was how—what mechanism would be used—to ensure the Superior Watershed Partnership's independence when Rio Tinto was paying for monitoring the Superior Watershed Partnership would do.

3. The agreement requires that disputes between the parties be resolved by a neutral, independent community-based umpire.

The agreement must ensure that neither party has the power to violate the terms of the agreement and that any disputes that arise between the parties will be resolved fairly. It's not hard to anticipate that there might be some differences between the parties in interpreting what the agreement permits and requires. This meant that the power to enforce the agreement and to resolve arguments had to reside outside of the Superior Watershed Partnership and Rio Tinto, with a third party. Accordingly, the agreement created a community-based "referee," the CEMP Board, an implementation mechanism established by the Marquette County Community Foundation. (More on the CEMP Board in Section 3.2).

4. The agreement provides for complete and timely data sharing with the monitoring entity and for maximum transparency with and outreach to the public.

The agreement establishes the processes and timelines for sharing of <u>all</u> data from <u>all</u> environmental monitoring of the project (including monitoring required by government permits and the project's own monitoring). It also ensures that the community will be able to see the agreements that established monitoring, how the monitoring is funded, and all of the information collected by monitoring. Since, even if there were no CEMP, much of the mine's monitoring data would be made public, the most important value that will be added by the Superior Watershed Partnership is in helping the community make sense of what the monitoring data means. This is particularly important when it comes to translating the technical data from environmental monitoring into information that community members can understand and use to assess the mine's environmental impact.

The agreement requires that community outreach efforts include community meetings and presentations, as well as information online.

5. The agreement has funding committed at the outset sufficient for implementation and should be open to additional funders for additional monitoring.

The agreement includes an initial funding commitment, provided by the party that will benefit financially from the project, which covers the estimated cost of monitoring for the life of the agreement. But additional funding can be provided by others not already a part of the agreement, as long as it will support monitoring that meets the conditions in the agreement.

The CEMP specifies an annual financial payment—a donation to the Community Foundation—by Rio Tinto. The amount was determined in negotiations between the company and the Superior Watershed Partnership. The financial exposure of Rio Tinto is capped, but unexpended funds could be spent in subsequent years.

6. The agreement is open to renewal, updating, and improvement.

The agreement has a fixed term, but can be renewed by the parties. The parties to the agreement can revise the agreement by mutual consent to adapt to changes in the project's realities. This was especially important because it was the first time any of the parties had entered into such an agreement, so it made sense to assume that during implementation they would find ways in which the agreement could be improved. Having a renewal point also allows the parties to take stock of how well the agreement is working and, together, to devise improvements

In the CEMP, the agreement is set to last three years, a term that made sense to the negotiating parties because of the phasing of the mine's life. And the parties expressed the intention to go longer: "The CEMP agreements are intended to cover the life of Eagle mine, from construction to mining as well as closure and rehabilitation. Eagle Mine and SWP may agree to renew this agreement for additional three year periods to cover the life of the mine."

2.5 <u>Design Implementation Mechanisms</u>

Agreeing on the design principles for a CEMP was a prelude to agreeing on the mechanisms—the rules, standards, procedures, financial commitments, organizational structures and authority, as well as the operative documents—that would be used to make the CEMP happen. This step, too, involved a give-and-take negotiation and it required more invention than anticipated, particularly the design of a CEMP Oversight Board. Until all of the mechanisms were spelled out in detail in the CEMP agreement, there could be no final pact. During this process lawyers also got into the act, to ensure their party was not agreeing to something it wouldn't be able to live with when it was implemented.

A complication that occurred: what had started as a two-party negotiation between Rio Tinto and the Superior Watershed Partnership morphed to some extent into a three-party negotiation with the addition of the Marquette County Community Foundation, which was to serve in a fiscal and oversight capacity, but had its own objectives and "must haves." As a result, the CEMP is made up of two interacting agreements: the monitoring agreement between Rio Tinto and the Superior Watershed Partnership, and a funding agreement that also includes the Community Foundation. Each agreement includes the other agreement.

Part III: Implementation Mechanisms in the CEMP

3.1 The Written Agreement

The CEMP Agreement was signed by the chief executives of the Superior Watershed Partnership and Rio Tinto Eagle Mine, and is legally binding.

It is a 16-page document that covers 19 topics, with 46 additional pages for nine attachments that provide detail about some of the implementation mechanisms. While that may seem extraordinarily long, it was necessary to cover the many details in a ground-breaking agreement. But every page was written in plain English, not legalese. This was to make good on the principle of maximizing transparency with the public, as was the decision to make the agreement available at the Superior Watershed Partnership's Web site (http://www.cempmonitoring.com/).

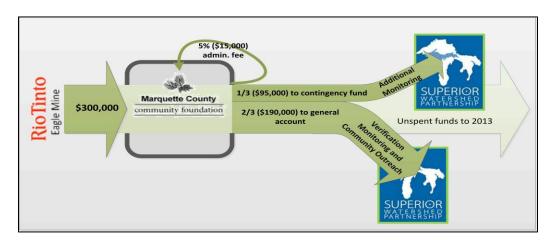
3.2 CEMP Fund

The CEMP agreement specifies that Rio Tinto will provide up to \$300,000 per year (for three years), plus an additional one-time contribution of \$300,000 to cover the Superior Watershed Partnership's set-up costs, including the purchase of monitoring equipment and setting up of an airmonitoring station and a Web-based communication platform for the CEMP. The exact annual amount will be determined by a budget that the Superior Watershed Partnership will include in the annual work plan.

The Marquette County Community Foundation provided the mechanism for funding the CEMP's work by the Superior Watershed Superior Watershed Partnership. As a Community Foundation it can accept donations for charitable purposes—and community-based environmental monitoring fits the government's definition of charitable purpose. Rio Tinto can and will contribute into the foundation's fund for CEMP implementation—and so can any other organization or individual. Non-Rio Tinto funds can be used for additional monitoring or to continue monitoring that was supposed to end because of other priorities in the Superior Watershed Partnership's work plan. However, additional monitoring must meet monitoring standards established in the agreement and must be conducted by the Superior Watershed Partnership or its approved subcontractor.

Technically, the foundation and Rio Tinto Eagle Mine created a "non-endowed" fund that would accept donations from Rio Tinto and pass them on to the Superior Watershed Partnership for doing monitoring work. The fund is the foundation's property and all donations are irrevocable; Rio Tinto can't get its money back under any circumstances, even if the CEMP were to be terminated.

This funding mechanism ensured that Rio Tinto's funding would go to a neutral third party rather than directly to the Superior Watershed Partnership, and that spending of the funds would only be guided by the terms of the CEMP agreement. This preserved the Superior Watershed Partnership's independence from Rio Tinto influence, in fact and community perception. At the same time, it made it possible for others within or even outside of the community to contribute to CEMP implementation, thus expanding the community's potential engagement with the CEMP.



3.3 CEMP Oversight Board

The Marquette County Community Foundation created a Board of independent community members (volunteers) to oversee the CEMP Fund; ensure that the parties implement the CEMP in

accord with the agreement's requirements, standards, and procedures; and resolve any disputes between the parties. Designing the CEMP Board's functions and membership was absolutely critical to forging the CEMP agreement because it ensured that a neutral, independent, community-based third party would oversee implementation. The Board must approve all Superior Watershed Partnership plans and budgets for monitoring. To be clear: the Board does not run the CEMP. That's up to the parties in the agreement.

The CEMP specified that the Board would have five members, four selected by the foundation in accordance with general characteristics spelled out in detail in the agreement—one each from the environmental science sector, mining sector, community at large and the Community Foundation board of directors—and one selected by the Keweenaw Bay Indian Community, representing the Anishinabe Nations. The foundation, which is governed by community volunteers, used a local personnel consulting firm to identify potential candidates for the sector-based seats on the Board. This ensured that the candidate-selection process would not be politicized, and would remain credible in the eyes of the community.

3.4 CEMP Annual Work Plan

The CEMP requires the Superior Watershed Partnership to develop an annual work plan that describes the activities it intends to take, a timeline for the activities, and a budget. The work plan will be made available to the public. Rio Tinto may raise with the CEMP Oversight Board any concerns it has about the proposed work plan, and the Board has final approval of the plan.

The work plan should cover the following topics in detail:

- Community environmental monitoring objectives
- Risk assessment (of potential impacts on the environment)
- Annual monitoring objectives, including sampling sites and facilities monitoring
- Publication/communication plan
- Community outreach
- Annual budget

(Much greater detail is available in Attachment B of the CEMP agreement, a table of contents for the work plan.)

3.5 Data-Sharing and Monitoring Standards

Data Sharing. The CEMP's rules about data sharing are concise and clear: "Eagle Mine will share all the data from its environmental programs with SWP (the Superior Watershed Partnership). SWP will make this data public." Eagle Mine must share all data within 14 days of it coming to hand, with two important exceptions:

- Serious risks: "Eagle Mine and SWP will tell each other, by phone or email, of any data
 that suggests a danger to community health or the environment, as soon as they become
 aware of the risk." And SWP will release this information to the community "as soon as
 possible."
- Breaches of permits: "Any data that shows that Eagle Mine has breached its regulations or permit conditions will be shared verbally within 24 hours of discovery." That has to be followed up by written communication within 14 days. This data will also be made public.

Monitoring. The CEMP agreement devotes seven pages—Attachments D, E, and F—to describing standards and methodologies for community monitoring, including identification of the pollutants whose presence is being checked, baseline data that will be used, and frequency of monitoring. These cover two categories of monitoring:

- *Verification* monitoring checks on Rio Tinto's existing monitoring of mine facilities, groundwater, surface water, flora/fauna, and air quality.
- Additional monitoring is at the discretion of the Superior Watershed Partnership and, from the outset of the agreement, identified additional monitoring of air quality and of new transportation routes for moving ore from the mine to a processing facility.

Additional Monitoring. Although under the agreement the Superior Watershed Partnership "may decide on its own" to do additional monitoring to better understand how the Eagle Mine is affecting the environment, there are some rules about how the Superior Watershed Partnership must proceed in doing this. First, it must develop a plan saying how it will do the monitoring, describing the baseline data and standards that will be used. It must give the plan and budget to Rio Tinto Eagle Mine for comment. Eagle Mine has 28 days to provide comments and if the Superior Watershed Partnership does not agree with the comments it must give its reasons to Eagle Mine in writing. At that point, if Eagle Mine objects to the additional monitoring, the issue goes to the CEMP Board for a decision. While the dispute is being resolved the Superior Watershed Partnership may start the additional monitoring, but it must stop immediately if the dispute process finds the additional monitoring will not help to understand the impacts of Eagle Mine.

3.6 Resolving Disagreements

The CEMP identifies two types of disagreements that may arise between the Superior Watershed Partnership and Rio Tinto—technical/scientific disagreements and non-technical disagreements about interpretation of the CEMP agreement—and establishes different processes for resolving each.

Technical disagreements—including about monitoring standards, interpretation of monitoring results, a need for additional monitoring—will be resolved through a peer review process. Either party can initiate a peer review process. A peer reviewer must be a scientific expert in the area of the disagreement. If the Superior Watershed Partnership and Rio Tinto cannot agree on a peer reviewer, then the Oversight Board has the authority to select a peer reviewer and determine the scope of the review. Both parties must abide by the peer reviewer's findings. The findings must be made public.

Non-technical disagreements will be submitted directly to the Oversight Board for a decision. Both the Superior Watershed Partnership and Eagle Mine must abide by the Board's decision.

3.7 SWP Community Outreach and Web Site

The CEMP agreement commits to community outreach, which "aims to make sure that the results of the monitoring program are available and understood by the community," and lays out some initial understanding of what such outreach, mostly run by the Superior Watershed Superior Watershed Partnership, would look like:

- All CEMP agreements (including the funding agreement with Marquette County Community Foundation, work plans, and budgets will be made public.
- SWP "will own any of the data it collects and will provide the data to the community in a way that is easily understood by the widest possible audience. Data will be made available on the Internet and SWP will decide when and how this is done."
- "Community outreach will include, at least, community meetings, presentations and online information."
- SWP "will ask the community for suggestions about the work of the CEMP. This will be done as part of the community outreach program. It is up to SWP to decide if it adopts these suggestions, but it must respond in writing to each one detailing the technical or scientific reasons for its decision. These responses will be open and available to the community."
- SWP "will develop a community outreach plan as part of the CEMP Work Plan. The community outreach plan will be updated each year along with the update of the Work Plan. An initial education campaign will include information on environmental monitoring currently done at Eagle Mine and monitoring that will be undertaken by SWP as part of the CEMP."
- "The community outreach plan will include annual community forums... on the outcomes of monitoring as well as presentations, brochures and website information. It will also include data for the Eagle Mine Community Scorecard. A schedule of community meetings and activities will be developed annually and included in the plan."

Even as the CEMP was being launched, the Superior Watershed Partnership set up a part of its Web site (http://www.cempmonitoring.com/) to handle a large amount of the community outreach. This is where all relevant documents are posted and where monitoring results will be made public in a Scorecard. It's also where anyone can send a suggestion or comment to the Superior Watershed Partnership's staff.



Part IV: Managing Initial Implementation Processes

The CEMP was just starting to be implemented as this booklet was being written. As verification and additional monitoring commenced, three implementation processes were underway:

- Organizing regular, reliable communications between the three parties: Rio Tinto Eagle Mine, Superior Watershed Partnership, and, for the first time, the CEMP Board appointed by the Marquette County Community Foundation.
- Setting up the CEMP Board.
- Bringing in the public—initiating community outreach using the local media and community forums.

4. 1 Organizing Operational Communications between the Parties

With a CEMP agreement in place, it's up to the parties to decide how the agreement's details will be implemented. Rio Tinto, the Superior Watershed Partnership, and the Community Foundation established a set of protocols about the steps their interaction would follow. At the same time, Rio Tinto and the Superior Watershed Partnership set up a technical group, which meets every few weeks to hammer out detailed implementation procedures for the organizations. Since it's likely that initial procedures will have to be revised as the organizations gain experience with implementing the CEMP, ongoing communication is a must.

4.2 Setting up the CEMP Board

When a CEMP Board first convenes, it has important work to do in preparation for addressing any disagreements that may arise between the parties. The Board must:

- Understand its role and responsibilities. This requires careful study of the CEMP agreement and, probably, some discussions with the parties to the agreement. It's essential for the Board to recognize that it is not for or against the development project (e.g., mining), but is focused on monitoring of the project. The Board also needs to be clear about what may not be in the agreement but is still being worked out by the parties, such as procedures the parties will use to notify each other of findings from monitoring. In the case of CEMP, it was important for the Board to understand that it had to keep the Community Foundation, which appointed it, informed of its activities.
- Get to know the parties. Meeting with them allows the Board to understand each of the players and their roles, and also lets the players get to know the Board members.
- Get to know the members of the Board. This is important, because the Board members will have to be able to work together to resolve disagreements among the parties. Time together and discussions help to build relationships and expectations.
- Establish clear recruitment procedures. Clear and public selection criteria for the Chair and the Board Members sets out the basis of their recruitment to the Board. Having a clear conflict of interest policy will be more important for smaller communities.
- Establish operating procedures. There are decisions to make: Setting up a regular meeting schedule. Determining whether meetings will be private or public. (The CEMP Board meets privately.) Determining what will be communicated to the public and how it will be done.

4.3 Bringing in the Public and the Press

It's critical to make sure that the local community, as well as the press (newspapers, television and radio news shows), understand what the CEMP is about and what to expect as it is implemented. This involves more than just issuing a press release, because community monitoring of the sort in the CEMP is a new way of doing things and the technical information involved in environmental monitoring can be quite difficult to understand. In addition, community engagement in the CEMP involves more than just receiving information; community members are asked to submit their ideas about what should be monitored.

In addition to a press conference to publicly launch the CEMP, the Superior Watershed Superior Watershed Partnership held a set of community town halls—in four communities—to inform the community about the CEMP and to start to gather feedback. It distributed information about other ways people could engage with the CEMP, such a hot line phone number and the Web site URL. Some community members praised the CEMP, others criticized it, but overall the basic facts about the CEMP were broadly communicated. (The Superior Watershed Partnership intends to hold additional town hall meetings quarterly in 2013 to report to the public and seek additional input.)

At the same time, the Superior Watershed Partnership, Community Foundation, and Rio Tinto were briefing the news media (reporters, editorial boards) about the CEMP, and distributing a Frequently Asked Questions sheet. They anticipated that a key question from the press would be about just how independent the Superior Watershed Partnership really was in determining what to monitor and what to tell the public. For the region's largest news source, the *Marquette Mining Journal*, the proof was in the doing. On April 15, 2013, the newspaper applauded the Superior Watershed Partnership's recent demonstration of independence:

"Two recent issues addressed by the Lake Superior Watershed Superior Watershed Partnership have demonstrated greatly desired independence in the group's Community Environmental Monitoring of Rio Tinto's mining activities in Marquette County.

"Despite the program's indirect funding by the mining company -which many people have been critical of- recent Superior Watershed Partnership commentary on an amendment to Rio Tinto's air quality permit and the group's detection and reporting of concentrations of uranium found in water samples at the bottom of a rock storage area at the Eagle Mine show the Superior Watershed Partnership is taking its role as an environmental watchdog over Rio Tinto's mining activities seriously.

"This is a positive step, which should help transform at least a few critics into supporters...

"All of the results of the partnership's community environmental monitoring are available online to keep the public informed. The group's involvement in testing and reporting—with the independence now demonstrated—should go a long way toward proving the monitoring program is what it was intended to be—a valuable community asset gauging the success of the mining company's mining, milling and transportation operations."

Part V: Resources: Where to Find Them

CEMP Agreement and	http://www.cempmonitoring.com/documents/
Attachments	
"The Unity of Place: Giving	http://www.cempmonitoring.com/wp-
Birth to Community	content/themes/cemp/pdfs/RT_CEMP-The-Unity-of-Place.pdf
Environmental Monitoring"	
CEMP Monitoring Scorecard	http://www.cempmonitoring.com/
History of Superior Watershed	http://www.cempmonitoring.com/history/
Superior Watershed	
Partnership activities in Salmon	
Trout watershed	
Eagle Mine Web site	http://riotintoeagle.com/operations/eagle-mine/
Mine website page on CEMP	http://riotintoeagle.com/approach/community/community-
	environmental-monitoring-program/