Mt. Fubilan Pit, Ok Tedi Mine. Photo courtesy of Ok Tedi Mining Limited.

The Ok Tedi Negotiations

Rebalancing the Equation in a Chronic Sustainability Dilemma

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Villagers. Photo credit: The Keystone Center.

"If this was your village, what would you do?"

—David Masani, Ok Tedi Mining Limited

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Abbreviations and Definitions

ARD – Acid Rock Drainage

CMCA Trusts – Funds provided pursuant to the Community Mine Continuation Agreements.

CMCA Review – The mandated review of the CMCA Agreement Operations triggered in part by environmental exceedences.

Interest-Based Negotiation – Interest-based (or "principled") bargaining is a method and style of negotiation that seeks to reach an enduring agreement that responds to underlying needs rather than postured positions. It is sometimes (and inaccurately) referred to as "win-win" negotiation and contrasted with "win-lose" negotiation. Key strategies involved in interest-based approaches involve: separating "people" problems from substantive problems and focusing on the latter; emphasizing interests over positions; generating a variety of options for consideration; and weighing those against agreed-upon criteria.

Kina – The currency of Papua New Guinea, with K1 equal to US$0.33.

MOA – Memorandum of Agreement.

NGO – Non-governmental organization.

OTML – Ok Tedi Mining Ltd.

OTDF – The Ok Tedi Development Foundation, a charitable arm of OTML that provides for a variety of services and projects in river corridor.

PNGSDP – the Papua New Guinea Sustainable Development Program Ltd., owner of 52% of OTML's share.

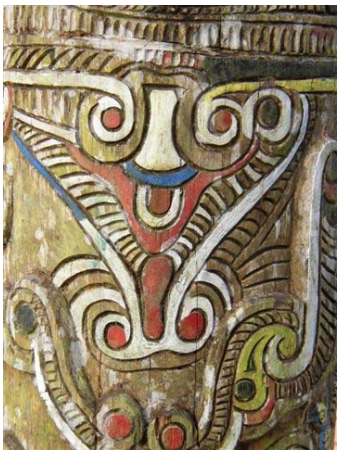
Sago – a powdery starch made from the processed pith found inside the trunks of the Sago Palm.[1] Sago is a staple food source in the Western Province.

Working Group – The working group set up to review the CMCAs, which included three community delegates from each of nine CMCA regions, PNG National Government, Fly River Provincial Government, OTML, church, environmental and women's representatives, and the Papua New Guinea Sustainable Development Programme, Ltd.

[1] Sago. (2007, August 18). In *Wikipedia, The Free Encyclopedia*. Retrieved 18:09, August 22, 2007, from http://en.wikipedia.org/w/index.php?title=Sago&oldid=151941191

Major Agreements

- The establishment of the Ok Tedi Fly River Development Foundation, a new entity that will give communities within the CMCA a high level of ownership and decision-making over resources, programs, and projects resulting from this Review.
- Commitments from OTML, government, and PNGSDP for K1.1 billion in funds, services, and projects.
- Clarification on eligible CMCA villages and a better process for accessing funds.
- Allocations and use of funds within the CMCA trusts, and special recognition of women and children and their needs.
- Agreements regarding the environment and community health monitoring and health education.
- Measures to improve project delivery.



Tribal design.
Photo credit: The Keystone Center.

Executive Summary

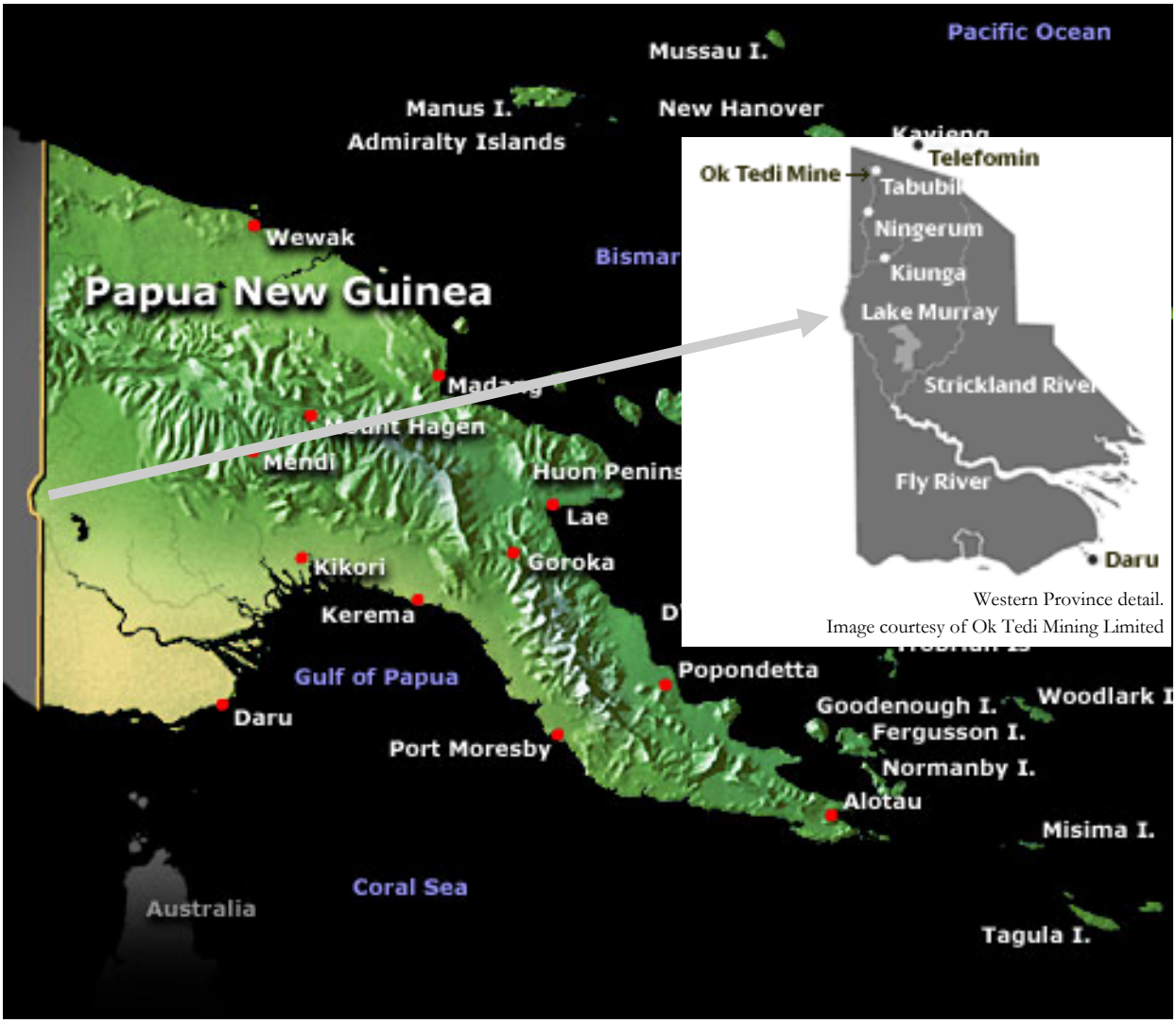
Between November 2005 and June 2007, a team from The Keystone Center helped organize and implement a multiparty negotiation process aimed at increased redress for people affected by river contamination from the Ok Tedi Mine in Papua New Guinea (PNG). Ok Tedi is often cited as one of the worst man-made environmental disasters in the world. It is also a true sustainability dilemma. The mine produces 20% of PNG's gross domestic product but it has also disrupted the traditional food webs and lives of more than 50,000 people by putting 90,000 tons of rock waste and tailings per day into the Fly River system.

After 18 months of effort, a major benchmark was accomplished. Delegates of the nine affected regions along the river, the mining company, the government, and others concluded a Memorandum of Agreement (MOA) that will ultimately give the people in the impacted area about 1.1 billion kina (roughly US$350 million) in funds, projects, and services. The negotiations were arduous and, as must be expected, no one side is fully happy. Nor are all issues neatly tied up in ways that will obviate all future problems or resolve every perceived injustice. Nonetheless, the negotiations achieved an important outcome and demonstrated a new and promising model for other discussions of similar scale and import. This paper describes the effort and offers reflections by the facilitators on what happened, how, and why. The opinions expressed are strictly those of the authors. All of the information the opinions are based on are matters of public record at http://www.wanbelistap.com and other public websites.

Facilitators and mining equipment. Photo credit: The Keystone Center.

The Setting and the Story

Papua New Guinea (PNG) is an independent country in Melanesia in the Western Pacific. Situated roughly east of Indonesia and north of Australia, it has a democratically elected government, a population of six million people, and 850 indigenous cultures and languages. New Guinea was colonized by the Germans; West Irian (now called West Papua) by the Dutch; and Papua by the British. PNG gained its independence from Australia in 1975. The country is rich in cultures and natural resources. Hidden in its remote landforms are some of the least explored and understood places in the world. It contains massive forested mountain ranges that run the length of the country, dense interior rainforests, a populous highlands region, and numerous tropical islands and coastal areas.



Map of Papua New Guinea. Photo courtesy of http://w2.byuh.edu/clubs/

When it became independent, the PNG parliament enacted laws claiming subsurface minerals for the state but recognizing the customary land tenure of its indigenous people under common law. Today, PNG's natural resources—oil, gas, metals, and forests—are under intense exploration and development, which has created a variety of tensions and conflicts. The Ok Tedi Mine is one of those flash points. Located in the Western Province's Star Mountains, approximately ten miles from the Indonesian border, the mine is operated by Ok Tedi Mining Limited (OTML). The region is known for its high rainfall, unstable geology, and frequent earthquakes.

Ok Tedi River. Photo credit: The Keystone Center.

The mine itself sits on Mt. Fubilan at the headwaters of the Ok Tedi River, which is a tributary of the 650-mile long Fly River system. Nearly a thousand kilometers long with a total catchment of 76,000 square kilometers, the Fly River system discharges between 3,000 and 7,000 cubic meters of water per second into the Gulf of Papua. The river, estuary, flood plains, lakes, and tributaries support one of the richest fish, aquatic, and wetland fauna in the Australasian Pacific, including 120 fish species and numerous types of reptiles and birds.

The river is also the depository of millions of tons of rock waste and tailings. That trade-off—the benefits and costs of large-scale environmental degradation weighed against large-scale economic gain—is at the heart of these negotiations.

> "It has been a very challenging and very rewarding process for all of us."
> – *Kori Maraga, Tanorama*

The Mine

Ok Tedi Mine was developed in the 1980s by a consortium of partners led by BHP Billiton (then, Broken Hill Propriety Company, Ltd.), an Australian company. They sought to exploit what was then believed to be one of the largest copper and gold deposits in the world. In 1981, OTML was incorporated to develop and operate the project to dig ores from an open pit, crush the rock it excavated in a large mill, extract the copper and gold, transport it downriver in a 157-kilometer slurry pipe, and then dry the materials for shipment to international customers in Japan, Philippines, Germany and Korea. The rock waste itself was to be stored in a tailings dam that would eventually be sealed. That plan did not work out.

Ok Tedi Mine. Photo courtesy of Ok Tedi Mining Limited.

In 1984, the foundations of the proposed tailings dam were lost to a massive landslide. It was further determined by the mine and the government that there was no other effective technical means for containing and stockpiling tailings. Realizing that the only feasible way of allowing the mine to proceed was by allowing it to put its rock waste directly into the river, the PNG National Parliament passed legislation known as the Mining (Ok Tedi Third Supplemental Agreement) Act 1983, which amended the Principle Agreement of 1976. For the next decade, BHP discharged 80 to 90 million tons of rock waste per year into the Ok Tedi River as copper and gold production increased.

Land owners soon reported that the project was causing major environmental damage in the form of mine-induced river sediment and a loss of food sources and safe water supply. They also brought suit and their grievances were heard in the Supreme Court of Victoria in Melbourne, Australia. The PNG Government responded to this legal action by passing the Mining (Ok Tedi Re-Stated Eight Supplemental Agreement) Act 1997, which outlawed the land owners' rights to bring actions for compensation in the PNG courts and simultaneously created a "General Compensation Package."

In 2001, OTML's ownership was restructured. Effectively, BHP bowed out at a moment of political and legal vulnerability leaving ownership of 30% with the PNG Government and transferring its 52% to a newly created long-term trust called the Papua New Guinea Sustainable Development Program Limited (PNGSDP). The remaining 18% was retained by Inmet, a private Canadian mining consortium spun off from one of the mine's original German investors.

The Damages

Since the mine commenced its operations over 20 years ago, more than 1.5 billion metric tons of tailings and rock waste have been discharged into the Fly River and its tributaries. These wastes have caused profound changes to the river system and the changes will continue well beyond the mine's currently scheduled closure in 2013. Peer-reviewed data and models by scientists from OTML suggest that the impacts in some river regions will last several hundred years and include:

- *The deposition of sediments from the mine over much of the river system with deep deposits in excess of three meters in some areas.* These deposits have raised the level of the river bed and significantly contaminated and silted associated lagoons, lakes, and tributaries. The deposits on the river bed are increasing and are moving downstream at a rate of about eight kilometers each year, causing a significant increase in the frequency, height, and extent of flooding in some stretches of the Fly River system.

- *A significant increase in bio-available copper throughout the river system down to the estuary.* Bio-available copper at relatively low levels is toxic to many aquatic plants and animals, and this pollution has caused the destruction of much of the phytoplankton in parts of the river.

- *Emerging evidence of acid rock drainage (ARD) on the levees that flank many of the main river channels.* ARD can dramatically change the chemistry of fresh water rivers. This outflow of acidic water is caused by the formation of acid in the mine wastes and is a characteristic phenomenon of mines and other large earth disturbances.

Ok Tedi River. Photo credit: The Keystone Center.

- *Destruction of large areas of lowland rainforest in some areas due to flooding, inundation, and sedimentation.* This dieback will eventually destroy most of the rainforest in some areas of the river corridor.

- *Large decreases in the quantity and variety of fish and other aquatic animals in the river caused by continuous and very high levels of turbidity, the destruction of habitat by sediment deposits, and the impact of copper on phytoplankton that supports the food web that fish depend on.*

The damages caused by the mine's waste disposal have had, and will continue to have, long-running implications for the 50,000-plus people who live in the impacted regions, many of them adjacent to or near the river. Sago is the staple food of most communities. The destruction of large areas of sago production due to flooding, especially in areas close to villages along the river and tributaries, will require many people to travel progressively longer distances to obtain smaller quantities of sago. Other changes in the food web are underway as well. These include a severe reduction of fish stocks, the diminishing of traditional fresh water supplies, probable increases in mosquito populations and malaria, and the forced dislocation of farms and gardens.

Ok Tedi River. Photo credit: The Keystone Center.

Some mitigation and remediation measures have been put in place. Limestone is mixed with the tailings to help neutralize acidity. Sediments are dredged at a point downriver from the mine. And more recently, a pyrite extraction system has been developed to help combat the growing long-term problem with ARD. Nonetheless, river aggradations, suspended sediments in the water, flooding and dieback, and the reduction of sago and fish availability are expected to cause continuing social dislocations well after the mine closes.

The Benefits

The Ok Tedi story is a sustainable development quandary: vast environmental damage weighed against significant economic gains. The mine pays substantial royalty payments to local land owners and employs 2,000 people, half of them from the Western Province and most of the rest (all but 93 expatriates) from other parts of Papua New Guinea. In a country with chronic low to no employment, these jobs are

coveted. They are well-paid, highly-skilled, unionized, exportable, and carry good benefits. The town of Tabubil where the mine is headquartered has a population of 25,000 people, a pharmacy, doctors, dentists, a supermarket, auto mechanics, banking, and micro-finance services. Downstream, the town of Kiunga has also flourished as a small regional center. But for the mine, none of this would exist and when the mine closes, these could both become ghost towns.

OTML also maintains a services arm called the Ok Tedi Development Foundation (OTDF), which delivers village level health care to remote river communities by boat and truck. It provides agricultural starter stock, schools, sewing machines, outboard motors, job training, small business assistance, special projects for women, assistance to farmers, and a variety of other needed and desired services. It is not an exaggeration to say that for 20 years the mine has stepped in to do much of the work that parliaments, prime ministers, and government departments, both local and national, have proven incapable of delivering.

That is the small picture. At a more macro level, the mine produces enormous wealth. In 2006, with metal prices at record highs on world markets and with an exchange rate of 1 kina per US$0.33, OTML generated 23.6% of PNG's Gross Domestic Product (GDP) on gross revenues of K25.1 billion. K5 billion were realized as profit. Of this, the Papua New Guinea Sustainable Development Program received 52%, Inmet 18%, and the national government 30%. Of the government's share, national government retained 50% (or 15% of total shares), 33% (10% of total shares) went to a fund for the people of the Western Province, the Western Province government received 8.3% (2.5% of total shares), and area landowners received 8.3%. Detailed financial information of OTML's earnings can be found at http://www.oktedi.com/reports/news.

Medical worker and patient. Photo courtesy of Ok Tedi Mining Limited.

International Reactions

The 1986 decision to allow disposal of rock tailings into the Ok Tedi and Fly River systems, along with the resulting downstream consequences, was severely criticized by international observers. Those in favor of the decision argued that the mine was producing significant amounts of foreign exchange that would enable national development in one of the poorest countries in the world. Those against it called it the largest intentional, man-made environmental disaster in the world.

The World Bank, a PNG donor and development lender, described the dilemma this way:

> *The data in the Risk Assessment indicates that from an environmental standpoint, the best option is to close the mine immediately. But the Risk Assessment also states that from a social standpoint this would result in a potentially disastrous situation because there is no preparedness for mine closure. But, the Risk Assessment does not adequately address the trade-offs between environmental and social costs nor does it provide any information or details on the mine closure plan or broader mine closure strategy.*

Tribal members.
Photo credit: The Keystone Center.

The World Wide Fund for Nature visited Ok Tedi in 2000 and offered the following:

> *The obvious action of ceasing mining is not likely to be acceptable to the PNG Government, as well, this would lead to serious local social problems that in themselves could produce even more dramatic environmental effects. Ok Tedi is the major business in the province—closure would precipitate a move to exploit any other available natural resources, with timber as the only obvious contender. Such a situation would lead to massive deforestation and subsequent establishment of commercial crops such as palm oil plantations. Neither of these actions if conducted under current PNG practices are likely to result in improved human capital or financial advancement of local people.*

The National Environmental Watch Group (NEWG), a PNG-based environmental non-governmental organization (NGO), wrote:

> *Mine closure would be a no-win situation. Ten, fifteen years ago, yes, but the scenario has changed so much that to close the mine would be doing everyone a disservice. So we've now got to look at the best, most transparent ways of ensuring people's future livelihood is taken care of. These communities cannot leave: that's their area, their culture, their livelihood. BHP has paid reasonable lump sums, but it has not had a lasting impact. NEWG wants to see long-term measures to rehabilitate the ecology and the social and economic dislocations, so that people can go back to the way they were.*

And Community Aid Abroad, part of Oxfam, described the Ok Tedi situation as follows:

> *A number of cases of multinational corporations infringing the basic rights of communities have been highlighted in recent months. These include the devastating cyanide spill earlier this year at the Australian owned Esmerelda mine in Romania for which the Perth based company admitted no liability. Closer to home is BHP's admission that its Ok Tedi mine will impact the Ok Tedi river system—and the 50,000 villagers dependent upon it—far more than previously thought. BHP now admits that none of the possible solutions it has investigated are feasible and has signaled its intention to sell its stake in the mine.*

The Lawsuit and Its Aftermath

In 1994, indigenous Ok Tedi and Fly River landowners residing in the river corridor brought suit against BHP in the Victorian Supreme Court in Australia. The lawsuit, filed by the Australian law firm of Slater & Gordon, was settled out of court in 1996 for approximately US$400 million. The settlement had four parts: a US$90 million package for the 30,000 people then living along the Ok Tedi and Fly Rivers, to be paid out over the life of the mine; a special package worth about US$35 million for the people of the lower Ok Tedi River who received some of the most immediate impacts of the mine; a 10% equity share in the mine, which is held by the national government of PNG in trust for the people of the Western Province; and a commitment to implement the most practical tailings containment option possible as recommended by the PNG government based on studies that the Ok Tedi Mine was charged with carrying out.

In 1999, BHP admitted that the waste from the Ok Tedi Mine had resulted in an "environmental disaster." In 2001, BHP began the process of divesting its interest in the mine. A new ownership structure was developed whereby the Papua New Guinea Sustainable Development Program Limited, a quasi-public agency, would be the majority shareholder of the mine, along with government and private shareholders. Villages along the river corridor were asked to give their consent for the mine to continue and in exchange, agreed to various cash compensations and community-driven investments through a set of trusts called the Community Mine Continuation Agreements (CMCAs).

Whether "informed consent" was actually achieved has been a matter of debate, but 14 different and unequal individual trust agreements were separately negotiated based on then current and projected damages. Just as important, a number of individuals and villages who had supported the lawsuit chose not to participate in the settlement. Included in the CMCA arrangement was a provision to review the operations of the agreement after five years, and/or if the environmental predictions for environmental impact outlined in the CMCAs were exceeded.

Aerial image of Tabubil. Photo credit: The Keystone Center.

By 2004, it became clear that the environmental conditions would be worse than originally predicted. OTML managers as well as many village leaders expressed a desire for a different and improved negotiation process. At the invitation of Australian consultants working for the mine, The Keystone Center presented two workshops in November 2005—one on the principles and practices of "interest-based" negotiation, the other on designing a prospective negotiation process. After these workshops, The Keystone Center was invited to be the lead facilitation organization for what would come to be "The Working Group on the 2006 CMCA Review." Keystone then sought a local PNG facilitation partner, which it found in a group called Tanorama, Inc. headquartered in Port Moresby. It was agreed that funding for the facilitation team and for other independent advisors and observers would be held in trust accounts beyond the reach and control of the company. These were set up through the accounting firm of Deloitte Touche Tohmatsu.

The CMCA Review – An Integrated Approach

Working closely with OTML, Keystone and Tanorama sought to constructively redress the major criticisms of the previous 1999 negotiations and build a better model for tackling the CMCA Review. Many community leaders had reported that the first CMCA negotiation process seemed designed to "divide and conquer" the people of the river corridor, with OTML negotiating separately with each region. Much jealousy and discontent resulted once regions inevitably discovered how other regions had fared and who the perceived winners and losers were. Further, community leaders argued that the original communication processes were inadequate, if not fatally flawed. Village leaders and members of the communities most affected by the agreements did not understand what they were signing.

Village meeting. Photo credit: The Keystone Center.

In order to address these two fundamental criticisms, Keystone recommended a facilitated negotiation model that would try to maximize opportunities for collaborative problem solving, transparency, and the highest possible levels of "informed consent" achievable in a country with isolated populations, extremely poor communication and transportation infrastructures, limited civil society, and high rates

of illiteracy. There would be no separate negotiations with different regions. Everything would be done with all of the regions together in the same room.

The first of many rounds of meetings was convened in each of the 157 villages along the river corridor. The proposed process was explained and each village was asked to select a leader to represent them in one of nine regional groups. In turn, each region was then asked to select three delegates to represent their region to the Working Group. The Working Group would thus be a subset of the regional leaders who would negotiate on behalf of all of the people in the affected area. Leaders would have the burden of acting on behalf of their entire region but would also be asked to seek solutions that would work for other regions. Delegates to the Working Group would sit side-by-side with OTML, representatives from national and provincial governments, the PNGSDP, and from NGOs that could provide a voice for environmental concerns, the interests of women and children, and the churches that provide many social, educational, and health services in rural areas.

Many regional leaders were initially hesitant about selecting only three Working Group delegates. They feared being marginalized in the negotiation process, not having their specific interests or language groups represented, or seeing old tribal, clan, inter-village, or inter-regional enmities disadvantage them in some way. Many villages proposed their own specific place at the Working Group table. After discussion, most villages readily understood the problem of trying to manage 157 delegations at any one meeting. They accepted the idea of more indirect representation and agreed that it would be the job of the Working Group delegates to act on behalf of all the people of the region while reserving any final decision-making regarding revised compensation agreements.

Working Group meeting. Photo credit: The Keystone Center.

Women's representation was especially problematic. Papua New Guinea is a country struggling to improve the condition of women who are often the victims of domestic violence and rape. Women face special health and welfare challenges, carry a disproportionate burden for child care and food production, and yet are frequently left out of decision-making and money management. It is therefore perhaps not surprising, though nonetheless unfortunate, that none were selected from the regions as delegates to the Working Group, a problem that was partially remedied later in the process.

Initial hesitations by community leaders to participate in the new process gave way and confidence increased with the development and signing of an initial negotiated document called "Terms of Reference for the Working Group on the 2006 CMCA Review." This charter specified three goals for the process: (1) to review information on the current and projected state of the environment; (2) to negotiate future CMCA compensation and benefits; and (3) to discuss new ways to work together in the future. The Terms of Reference also spelled out representation to the Working Group, the expectations and obligations of all delegates, a preliminary schedule of meetings, how decisions would be made, the role of the independent facilitators and observers, and what would happen in the event no agreements were reached.

The question of how the group would make decisions was especially important. Working Group members agreed that they would seek full consensus around compensation, benefits, and new and better ways of working together. A "full" consensus was defined as an agreement that all of the Working Group delegates could live with a solution. A "partial" consensus was defined as a majority of delegates agree they can live with a solution. "No" consensus was defined as when a majority of delegates could not agree on a solution. It was further agreed that should a delegation choose to leave the Working Group process, walkouts being a somewhat routine practice in many PNG meetings, their region would still be eligible to receive benefits but that delegation would forfeit any further role in influencing decisions about the larger distribution of benefits and compensation. Over the course of the 18-months of negotiations, no one left the table.

Delegates meeting. Photo credit: The Keystone Center.

The negotiation was designed to track over three broad phases. The first would be a full and open exchange of economic and scientific information and the creation of criteria for making ultimate decisions about compensation. The second would be the development of one or more proposed packages containing different compensation options. The third would be actual decision-making around a preferred and mutually acceptable option. It was also agreed that before and after each of the six scheduled Working Group meetings, regional and village level meetings would be held to ensure the fullest understanding of issues and options and to garner feedback on any emerging package.

Every village had the opportunity to have a number of facilitated meetings to understand how the process was progressing. Most chose to take advantage of this offer. A few declined for reasons not always pertinent to the negotiations. Some villages that had serious internal divisions (between lawsuit supporters and non-supporters, land owners and land users, clans and tribes at odds with each other) chose not to have meetings. Whenever possible, facilitators tried to meet separately with village women to encourage their special engagement and participation. In total, over 500 meetings took place throughout the CMCA Review.

Women and children. Photo credit: The Keystone Center.

The Role of Independent Facilitators, Observers, and Legal and Science Advisors

As part of its duties, the independent facilitation team's charge was to serve as both architects and guardians of the process. Keystone, Tanorama, and OTML agreed that to build further confidence, the process also needed independent observers who would attend all meetings at the regional and Working Group level and who would verify that the process embodied and met the following value tests: equity; responsiveness; transparency; integrity; fairness; participation; respect; adequacy of information; and timeliness.

Sir Arnold Amet, a respected former Chief Justice of the Supreme Court of Papua New Guinea, and John Kawi, a well-known former PNG Solicitor General, agreed to take on the duties of Independent Observers. Regional leaders and delegates would often applaud following their comments since both men are well-known and highly regarded for their intelligence, leadership, and moral judgment. The observers were asked to unabashedly comment on the extent to which the principles were being adhered to and their reports can be found at http://www.wanbelistap.com, along with many other documents pertinent to the entire negotiation process.

From the start, villagers, regional leaders, and delegates were also adamant that they have access to a legal advisor to provide counsel on, and improve understanding of, any proposed new compensation package. As the negotiations proceeded, it became clear that there was a need for an advisor that could provide general guidance as well, especially to the delegates representing villages. The Working Group agreed that Sir Arnold Amet could transition into the role of "Special Advisor." Sir Arnold's Independent Observer duties were then picked up by Dr. Beno Boeha, a university professor and former government official. As Special Advisor, Sir Arnold helped delegates representing the CMCA regions develop and refine proposals and their strategies for communicating with other stakeholders, especially key government officials such as the Minister of Mining. As a draft agreement took shape, Sir Arnold offered general legal context regarding how the new agreement might be made binding and enforceable.

Sir Arnold Amet (left) and Dr. Alan Tingay. Photo credit: The Keystone Center.

Central also to the concerns of the regional leaders and NGO representatives was the extent to which environmental impacts from mine waste might impact community health, both currently and in the future after the mine closes. OTML had conducted many studies regarding the environmental impacts of the mine, particularly in the Lower Ok Tedi and Middle Fly regions. However, given that the peer review scientists were selected and paid for by OTML, there was a lack of full confidence in their findings.

In the course of the negotiations, therefore, it was agreed that an independent scientist would be selected and retained by the full Working Group. A committee comprised of the environmental NGOs' sole representative, OTML, and three community representatives drafted a scope of work and then guided the selection process on behalf of the larger Working Group. The committee created criteria for selection of the scientist and empowered Keystone to identify and interview prospective candidates. Dr. Alan Tingay, an environmental scientist from Western Australia was then selected by the committee and approved by the larger Working Group.

John Kawi. Photo credit: The Keystone Center.

Recognizing that the timeframe would not allow for the generation of original research, Dr. Tingay was asked to review and comment on OTML's existing scientific studies, to travel down the mine-impacted corridor and speak with communities about their observations of

impacts, and to report his findings at the fourth Working Group meeting. His presentation is available at http://www.wanbelistap.com. Essentially, his review stated that OTML's research and findings were not unreasonable but were limited. There were, he suggested, major gaps in the research, particularly related to what the long-term impacts might be in the South Fly Regions. Dr. Tingay also recommended that there be a funded community health initiative linked to long-term monitoring of the river and mine-related health impacts.

Working Group Meetings, the Women's Caucus, and the MOA

The 50 members of the Working Group met six times between February 2006 and April 2007. Hundreds of facilitated regional and village meetings were held before or after each of the six Working Group meetings. The design of the meetings and the choreography of the negotiations were intentionally aimed at creating as much trust-building, information exchange, fact-finding, deliberation, and "interest-based" bargaining as possible. The full record of each meeting is available at http://www.wanbelistap.com.

Working Group meeting. Photo credit: The Keystone Center.

At the start of the Working Group process, the remaining value of funds available from the original CMCA agreement (from 2007 to expected mine closure in mid-2013) was roughly K78.8 million. At the second Working Group meeting, OTML offered K118.2 million as a guaranteed floor plus more if copper and gold sales proved better than 2.5% of cash flow. At the third Working Group meeting, community delegates put forward an unquantified interest-based proposal for new health, education, and job training services, new infrastructure, and unspecified new amounts of cash. Unofficial estimates put the value of the package proposed by the community delegates at between one and three billion kina. At the fourth meeting, OTML, in combination with PNGSDP and national government's Minister of Mining, came forward with a combined proposal of K820.9 million. After further discussions between meetings and at Working Group 5, the parties agreed, in principle and subject to ratification at the regional and village levels, to a package valued at K1.1 billion.

As always, numbers by themselves do not tell the full story. In fact, they often obscure many important and salient specifics. The negotiations sought to confront many important cross-currents and tensions. While all of the delegates collectively sought to "expand the pie" in their negotiations with OTML shareholders, the community delegates also had the task of "dividing the pie" between and among the nine river regions. Land owner and land user interests were at odds, as were the interests of those who had or had not supported earlier lawsuits. Many of the mechanical and administrative questions of how new financial arrangements would work were also in question as the process unfolded.

Women's meeting. Photo credit: The Keystone Center.

Nonetheless, the deal that finally emerged, captured in a Memorandum of Agreement (MOA) dated April 15, 2007 and finalized on June 29, 2007, created nearly US$350 million in new cash, benefits, services, and infrastructure commitments along with the formation of a new entity that would set priorities for spending some of the funds for development from government, and that would have influence over future infrastructure investments in the river corridor by PNGSDP. Furthermore, the MOA made structural changes to some of the trust arrangements through which individual families are able to receive cash, enhanced the role of village level planning, and created a potential future mechanism for future advocacy as to the monitoring of environmental conditions and community health after mine closure.

While the elected male regional leaders were charged with representing all of their people, the unique voices of women and children were initially woefully under-represented. Customarily, most tribes, clans, and villages in PNG are male-dominated. That said, most international development organizations acknowledge the central role women play in managing and investing micro-finances and actually engaging

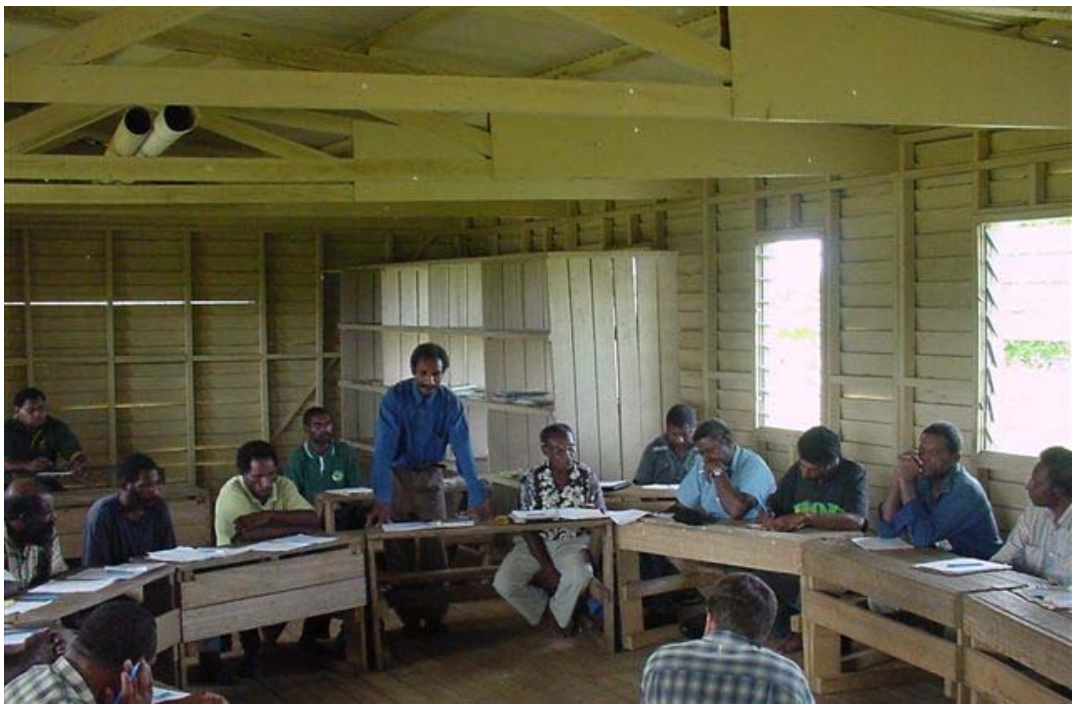
> "This is not easy work but when you have outcomes like this the effort is well worth the price of working in the worlds remote places. Kudos to you and your team. Thanks for making the world a better place!"
> – *Keith Faulkner, Managing Director, Ok Tedi Mining Limited*

in development work beneficial to their communities. With organizing help from three women and two women staff from OTML, NGO delegate Ms. Ume Wainetti organized a special week-long women's meeting that brought together women leaders from many of the regions and villages of the corridor.

The meeting served two important functions. First, it informed women more fully of the Working Group's discussions about issues and options. Second, it spurred the creation of a "Women's Proposal" that was then presented and adopted by the full Working Group. The women's proposal offered specific resolutions aimed at increasing women's access to, and participation in, future decision-making. It also created a commitment to dedicate a minimum of 10% of the full financial package to issues, projects, and services relevant to women and children.

Regional and Village Endorsements

After negotiations on the MOA were completed on April 15, 2007, the Working Group's job was largely done. Working Group representatives from the nine regions formulated a letter to their people stating: "Although the resulting outcomes may not be perfect, we are very proud of what has been accomplished." The letter ended with: "The next step in the process is for you to evaluate this set of outcomes in consultation with your village."



Working Group leaders Jacob Kabogi, Abel Daruko, and Kenny Maba. Photo credit: The Keystone Center.

Following the Working Group meeting, a draft of the MOA was taken back to regional and village meetings. During May and June of 2007, most of the 157 villages in the region recommended that their leaders proceed to sign the final agreement. A signing ceremony by the Working Group was held in Tabubil on June 29, 2007 and, over the months of April to June of 2007, additional meetings and signing ceremonies were scheduled to follow in each of the nine regions. The full MOA can be found at http://www.keystone.org/spp/env-oktedi.html.

Observations and Reflections

A great deal has been spoken and written about the history, politics, anthropology, and economics of the Ok Tedi Mine. The comments that follow are confined to the CMCA Working Group negotiation process and seek, from our perspective as mediators, to capture lessons-learned that may have relevance to other negotiation efforts of future magnitude and impact.

1. **No Perfect Process, No Perfect Outcome.** Democracy is messy. So are negotiation processes that would purport to be more democratic. The design used for these negotiations grew out of a series of assessment and training workshops. While there is no one, single process that can meet every need and expectation, early training sessions in more principled approaches to negotiation and problem solving coupled with as much stakeholder participation as possible in the design of the Working Group's features, lent early credibility and foundation for what later ensued. The process that followed the training, while not perfect, satisfied the most essential procedural needs: (a) a single negotiation; (b) conducted with as much transparency as possible; and (c) linked to the communities and local decision-making.

2. **Dilemma Taming.** Facilitators, mediators, and stakeholder engagement specialists like to frame their work with the words, phrases, and jargon of "conflict resolution." In the largest scheme of things, the Ok Tedi negotiations were less about problem "solving" and more about problem "taming." Like the book and film *Sophie's Choice*, the mine is a terrible dilemma: vast economic benefits and advantages standing squarely against decades of environmental degradation and perceived injustice. As embodied in the MOA, the result was less about "resolution" and more about creating a new ratio of benefits-to-impacts. Fundamental sustainability paradoxes like Ok Tedi can never be fully reconciled. They can, however, be managed in new and creative ways that are fairer, smarter, more efficient, and more transparent than what existed before.

> "Everyone has learnt something from this process so everyone's a winner."
> – *Tony Keket, Tanorama*

3. **Local Partners.** When foreign entities like The Keystone Center are asked to serve as facilitators and consultants, it is absolutely essential that they find and work with in-country partners. This must be viewed as a "best practice" in the allied fields of conflict resolution and is a standard procedure for many international aid organizations. Keystone had the great honor of working with Tanorama, Inc., a PNG firm led by one of its founders, Mr. Martin Brash. The partnership with him and his colleagues proved effective, each organization bringing complementary and necessary skills and insights to the endeavor.

4. **The Role of NGOs.** Non-governmental organizations are often most comfortable and effective in the roles of critics, advocates, and experts. Three NGO delegations were asked to participate in the process to help ensure strong perspectives on environmental issues, issues pertinent to women and children, and perspectives on the delivery of social services. Because they weren't direct beneficiaries to any potential revised compensation, they acted as the quiet "conscience" of the Working Group. Participation from NGOs that could represent churches and women and children proved easier than representation from the environmental community that had, in fact, been particularly critical of the mine. It proved especially difficult to find environmental representation. Ms. Matilda Koma of the PNG-based Center for Environmental Research and Development (CERD) did an admirable job of such representation but many other environmental groups that were approached, both domestic and international, were reluctant to participate. Had they stepped forward, a stronger international NGO perspective and network would have provided some important experience to the Working Group in both the development of resolutions and in looking toward attracting future development partners.

Children observing. Photo credit: The Keystone Center.

5. **Gender Balance.** Given women's roles in emerging economies, it is important to have women's perspectives at the table when looking toward effective and sustainable solutions to development challenges. Traditional leadership structures in PNG do not lend themselves to this. As the Working Group process evolved, women were not elected to any of the 150 leadership positions involved in the negotiations. This created two problems—one of information dissemination and the other of representation. Mid-way through the 18-month process, the facilitators learned that community leaders who were supposed to be representing men, women, and children were not communicating fully or effectively with the women in their villages. Secondly, while the process had an exceptional women and children's NGO advocate in Ms. Ume Wainetti, the voices of the women living in many

of the mine-impacted regions were not present. The special Women's Caucus, initiated by Ms. Wainetti with the help of Ms. Janesse Brewer from The Keystone Center and Ms. Kori Maraga from Tanorama, helped ameliorate some of these problems.

6. **Interest-Based Negotiation Challenges.** The Keystone Center is asked to assist in a wide variety of energy, environment, and public health challenges. Wherever possible, we recommend that parties structure and pace their negotiations using the principles of "interest-based" bargaining. In interest-based negotiations, participants focus on what they need and why they need it and structure their positions accordingly. In contrast, positional bargaining plays out more like a poker game in a series of demands, offers, feints, bluffs, and counters that have little grounding in the quantified needs that lie behind positions taken. As it turned out, the Ok Tedi negotiations, even though they succeeded in concluding a significant Memorandum of Agreement, did not maximize the interest-based bargaining model as effectively as it might have. Community delegates created an interest-based proposal for the other stakeholders to consider but it had no monetized positions. In turn, the government, OTML, and PNGSDP presented monetary offers without any linkage to the needs-based proposal of the delegates. This created a variety of smaller frustrations that were ultimately overcome through the final MOA negotiations but at the cost of some unnecessary frictions.

7. **The Mine as Villain and Champion.** Large-scale, multi-party consensus building processes do not take place unless there is high-level political and financial support. In many cases, this sponsoring role would be played by government. In this instance, it was played by the mine that is owned in part, but not solely, by government. OTML has been the target of much criticism, both domestically and internationally, from communities, NGOs, and academics. In the drama of natural resources disputes, mines and miners make good "villains." It is unusual, and sometimes confusing to critics, for them to also be champions. The Working Group process would not have occurred but for the willingness of the mine's current senior managers to engage in, fully finance, and give up some procedural control for a more progressive model of negotiation.

"This process has been robust and vibrant. For us observers, we would commend this process. It is important we have come to a stage where the government should seriously consider incorporating this kind of process, a real process of consultation, in resource developments in PNG."
– *John Kawi, Independent Observer and former Solicitor General*

8. **Perceived vs. Actual Independence.** The Working Group process utilized the services of two teams of independent facilitators, an independent legal advisor for the community, two independent observers, and an independent scientist. To achieve actual independence and minimize the possibility of "capture," all funds used to support the process were placed beyond the reach of the mine and then administered by an independent accounting firm. To further assure independence, ground rules spelling out the roles of each of the independents were explicitly created and agreed to by all delegates, including OTML. These roles were guarded carefully and provided good checks and balances.

9. **Consent vs. Consensus.** In the U.S., Canada, and Australia, most stakeholder engagement processes can be described as an attempt to achieve consensus. "Consensus" is defined differently in different circumstances. One definition may be "no one objects." Another might be achieving some kind of plurality. In the Ok Tedi negotiations, consensus was defined as a graduated set of levels: none, partial, or full. Keystone and Tanorama also used a five-point preferencing tool using TurningPoint® software to periodically measure the Working Group's levels of agreement. Politically, however, the real goal was not consensus but sufficient political "consent" for new compensatory actions to achieve standing and be taken forward by government and the mine's shareholders.

10. **Compensatory Outcomes.** The final package contained three sources of funds for a total of K1.1 billion. K324.1 million is to be provided by OTML to the trusts to be used for cash, projects, investment, and support for women and children. K139.7 million (plus more if dividends are better than 2.5%) is to be provided by PNGSDP for infrastructure. K466.6 million will be available to the newly-formed Ok Tedi Fly River Development Foundation (OTFRDF) from the government; and another K79.7 million will be available, also for infrastructure, from the Tax Credit Scheme. It is not the place of the facilitators to judge the substantive outcome; we leave that to the parties. Nonetheless, we end our work with one worry: that the final agreement may not prove supple enough to respond to the wide-ranging needs and interests identified by the community leaders because of the inherent restrictions that come from each of the different contributing sources: OTML, PNGSDP, and government.

11. **Environmental and Community Health Monitoring.** Important resolutions were passed and embodied in the MOA regarding priorities for long-term environmental and community health monitoring. Many questions and concerns remain about which agencies, public or private, will assume responsibility and provide adequate resources for monitoring and public health education. For the Southern Fly regions, where potential environmental impacts from the mine are the least understood, the greatest impacts may be yet to come as large slugs of mine waste travel down the river. Issues on both of these topics were raised throughout the process at the village, regional, and Working Group meetings. OTML chose to reserve the issue of any new potential mitigation to its own decision-making rather than seek agreements on those from the affected communities. They believed those issues to be beyond the scope of the CMCA Review and argued that they themselves would take appropriate action in concert with the PNG government.

12. **Implementation Issues.** The agreements reached in the Working Group process represent a fresh and ambitious new arrangement for all parties. The Western Province of PNG, as with many developing regions, has substantial challenges in terms of accountable and strategic management of funds and the implementation of agreements. The Western Province remains the least developed region in PNG. With little to no transportation infrastructure, the delivery of simple development projects requires extraordinary resources and logistical coordination. The greatest long-term hope for the impacted regions may be the collective and strategic uses of the substantial funds from the new CMCA agreement to address pressing development needs and the ability to leverage additional funds. For these new agreements to have a meaningful and positive impact on the people of the Western Province, those in charge of financial management will need the long-term perspectives and supporting partnerships of the people who forged the Memorandum of Agreement. PNG has a long history of big plans and failed implementation.

> "It's a unique experience. I've never seen real contact with people in the village like this. I'm satisfied and I'm fortunate to be involved in this process."
> – *Lalatute Avosa, Tanorama*

13. **Leadership Tensions.** While every negotiator must ultimately pursue his or her own aims, it is an article of faith for facilitators that people can (and should) decide for themselves what is in their own interests. This created certain dilemmas. For example, throughout the negotiations, community delegates expressed a desire to see more cash available to individuals and families in their villages. Mine leadership, however, repeatedly stated their desire that less money go for cash, which in their experience is often squandered, and more money for development projects and investment. When the draft agreement was taking shape, OTML leadership did not explicitly limit or cap the amount of any payments that could come in cash form. As a result, community regions chose to allocate substantial resources from the new agreement for cash distribution. Another difficult issue was addressing "the split" as to how funds would be divided among the CMCA regions under any new agreement. After repeated attempts to discuss this issue, several stakeholders described this issue as "too hard." Community delegates could not redistribute the funds among themselves without creating fierce competition among their regions. Yet, without a mutually agreed upon or objectively based criteria to distribute awards among regions, representatives of OTML were understandably reluctant to make "split" decisions unilaterally. As a result, the relative distribution of funds remained the same as in the original CMCAs, which were negotiated under what is widely recognized as a flawed, incomplete process.

14. **Building Suspension Bridges.** Carrie Menkel-Meadow, a law professor at Georgetown University and an expert on negotiation and mediation, talks about conflict resolution as a persistent search for a stronger connection between "peace" and "justice." She notes how the two are intimately connected

but, paradoxically, seem never to meet in permanent ways. The same is sometimes said of "truth" and "power" both of which have multifaceted meanings and both of which often lie in the eye of the beholder. At Ok Tedi, new bridges were built. The degree to which those new suspension bridges become permanent will only be known with time.

Epilogue

We end our work in PNG with great pride and a renewed belief in the power of well-crafted multi-party negotiation processes. Given the right conditions, individuals with different ideas and beliefs can, and do, bring forth a collective and durable wisdom. The many people who participated in these negotiations from PNG's villages, from the mine, from the NGOs, and from the government will be in our hearts forever.

Villagers gathering for a meeting. Photo credit: The Keystone Center.

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Arriving at a village meeting. Photo credit: The Keystone Center.

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