# Federating and defending: water, territory and extraction in the Andes<sup>1</sup>

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Peru, Bolivia and Ecuador have each seen a significant increase in extractive industry activity over the last decade and a half. This raises many questions for communities that live in the areas in which mining and hydrocarbon activity is occurring. Among these, the implications for water resources and indigenous resource governance are among the most significant. Water questions are also of much concern for populations living downstream of that activity. Extractive industries place pressure on, and introduce new risks for, the quantity and quality of water available to rural communities and urban centres. It also poses threats to the *de jure* and *de facto* rights that communities have historically exercised in order to access and control these water resources and to govern the territory in which these reside. These perceived and actual threats have catalysed organized responses as populations have sought to protect their territory and their ability to govern the natural resources within it. At times these responses have led to conflict and violence. The anatomy of these responses varies from case to case: in some instances, responses are led by federations of communities, in others they involve much wider alliances of actors who are rural and urban, indigenous and not, national and international. There is also much variability in the relative resilience and effectiveness of these responses, though whatever the case, these different patterns of mobilization around extraction have transformed the social and political landscape for water resource management in the region.

In this context, we seek to do the following in this chapter. First, we give an overview of recent patterns in the extractive economy in the region and document certain features of its expansion. Second, through a combination of maps and specific examples, we draw attention to some of the implications that this growth in extraction has for water resources and indigenous territory. Third we discuss the socio-political

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responses that have resulted, paying particular attention to the diversity in the ways in which populations have organized themselves to confront these new pressures. Fourth we deal with one case in some detail in order to explore the alliances and tensions that exist within these supra-communal mobilizations, the ways in which water and resource governance are argued over and the difficulty of finding ways forward that might guarantee rights and avoid violence. The following sections address each of these purposes in turn. The conclusions then elaborate larger issues of governance that are raised by these patterns of expansion in the extractive economy and the ways in which these interact with processes of grassroots organization, alliance building and conflict.

## A. Extraction, water and territory

## **Expanding extraction ....?**

The "majority of mining concessions are on indigenous and campesino lands" Marlon Santi, 2009

President of the Confederation of Indigenous Nationalities of Ecuador CONAIE,<sup>2</sup>

On January 21<sup>st</sup>, 2009, journalists estimated that some 12,000 people took to the highways and byways of Ecuador in marches convened by the Confederation of Indigenous Nationalities of Ecuador (CONAIE) to protest against new mining legislation (Moore, 2009). Various arguments suffused this mobilization (along with other protests that preceded it). Some draw on a nationalist-left rejection of large scale foreign investment in the resource sector; some are inspired by commitments to human rights; others are based on convictions that extractive industry constitutes an unacceptable invasion of (formal or de facto) territories occupied and governed on a day to day basis by indigenous and campesino communities; and yet other components of these arguments are environmental and pertain, above all, to water.<sup>4</sup> East of the Andes, earlier experiences of the serious damage that oil expansion has visited on water courses, indigenous territories and local organization (e.g Sawyer, 2004; Ortiz, 2009; Fontaine, 2006) inform concerns that the same will now happen with mineral expansion. In the sierra, experiences learnt from Peruvian mining coupled with awareness of the geographical overlaps between mining concessions and watersheds, nourish the fear that water supplies will be adversely affected by mining's needs for large quantities of water as well as its removal of water-bearing hill tops for open pit extraction. With people believing that the new legislation – by and large endorsed by the industry - paves the way for an onset of large scale open cast mining, such worries about the security of water resources facilitated a large scale community mobilization.

This jump in investment has already happened in Peru for both the mining and hydrocarbons sectors, while in Bolivia it has occurred much more evidently in the hydrocarbons sector than in mineral extraction (though there has been a notable

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<sup>&</sup>lt;sup>2</sup> Quoted in Moore, 2009

<sup>&</sup>lt;sup>3</sup> We should note that the journalist, Jen Moore, is a collaborator in the research programme that Bebbington leads, TCD-Andes: www.sed.manchester.ac.uk/research/andes.

<sup>&</sup>lt;sup>4</sup> We also recognise there are several varieties of environmentalism at play in these conflicts (Bebbington and Bebbington, 2009).

increase in mining investment post-2003).<sup>5</sup> These antecedents are known to Ecuadorian indigenous leaders and their allies, and are another significant source of unease. When the nature of this increased investment is presented graphically it is not difficult to understand the reasons for this unease. Let us begin with mining. Some experts in Peruvian non-profit research centres<sup>6</sup> have estimated that by 2006 over half of registered peasant communities were affected by mining activity – mostly because of their proximity to, or location within, areas that had been given by the state as mining concessions. Figure 1 suggests why such estimates might be well founded. The graph shows that since 2001, the number and area of mine claims made each year have each increased significantly. Figures 2 and 3 suggest some of the spatial consequences of such growth – taking the example of two different departments in Peru: Cajamarca and Piura. Cajamarca is a consolidated mining department, as is abundantly clear from the spatial extent of claims. Piura on the other hand is a new frontier for mining, yet even here a significant share of the surface has been affected by claims to subsurface mineral rights.<sup>7</sup>

The images for hydrocarbon expansion – in purely spatial terms – are even more dramatic (see Figure 4, Finer et al., 2008). Around two-thirds of Ecuador's Oriente is subdivided into blocks for exploration and exploitation, while in the Peruvian Amazon the figure is closer to three-quarters.<sup>8</sup> In Bolivia the area is less extensive, though still significant, and one sees the government promoting an important expansion into Norte La Paz, Beni and Pando – all areas with no real hydrocarbon tradition. This is coupled with a further phenomenon of interest, the setting aside of vast areas in the highlands of Potosí and Oruro (traditional hardrock mining departments) as areas of hydrocarbon potential. This process seems set to continue, as the current government seeks new sources of gas and oil in departments that are more supportive of its political project than are the eastern lowland departments from which most hydrocarbons are currently extracted.

## Figures 1, 2, 3, and 4 about here

### ..... and threats to territories and water ....?

Of course, not all concessions and contracts become mines or oil and gas wells, so one has to be careful before extrapolating too much from such diverse processes. Still it remains significant that large parts of many of Peru's major drainage basins are now subject to mineral concessions: 41 per cent of the Jequetepeque and Santa river basins, 40% of the Rimac (which provides drinking water to Lima), 26% of the Mantaro, 31% of the Apurimac and so on (Bebbington and Bury, 2009). Yet more important is that concessions for hard rock minerals tend to be given in higher altitude headwater areas – consequently the impacts on or risks for water are likely to extend downstream. In some cases concessions are given in areas that have already been

<sup>7</sup> Section C discusses the case of Piura in more detail.

<sup>&</sup>lt;sup>5</sup> While there has been some increase in international investment in mining in Bolivia, this has been on a far more modest scale - in part, perhaps, because there is a strong cooperative sector in the sector that owns many of the concessions there (this was part of the arrangements when mines belonging to the state mining company, COMIBOL, were closed in the mid-1980s).

<sup>&</sup>lt;sup>6</sup> In particular Cooperacción: http://www.cooperaccion.org.pe/

<sup>&</sup>lt;sup>8</sup> This expansion was concentrated in the period between 2004 and 2007, during which the proportion of the surface area of the basin granted in concessions increased from around 14 percent to 70 percent.

granted protected status as water sources for cities and communities. One recent case of this is the Aguarague National Park in the Bolivian department of Tarija. The Serranía protected by the park is deemed to be the source of water for an otherwise dry Chaco, home to Guarani and colonist populations alike, and, more generally, the Chaco woodlands constitute South America's second most important, intact forest. Yet in late 2008/early 2009 it appeared clear that the Bolivian government was going to allow Petrobras of Brazil to begin a large-scale gas exploration programme, with seismic testing affecting large parts of the park. Together with another PetroAndina project, the two initiatives could run the entire length of the park. At the same time the government was allowing a little known company, Eastern Petrogas of China, to begin operating in the buffer zone of the park, where it will combine environmental clean up<sup>9</sup> with exploration oriented to rehabilitating abandoned wells and bringing them back into production by drilling down deeper. In the highland department of Ancash, Peru, mineral concessions overlap with community-controlled private conservation districts. Meanwhile in the Amazon basin, Ecuador's government is considering allowing oil extraction in the Yasuni National Park, home to indigenous peoples in voluntary isolation, <sup>10</sup> and a number of hydrocarbon concessions in Peru overlap with areas previously protected as indigenous territory (as reflected by very influential maps produced during 2007 by the organization Instituto del Bien Común). It is not clear how much either government worries about such overlaps. Indeed, Peru's President Alan Garcia has suggested that organizations raising concerns about such phenomena are little more than unreconstructed communists, and has gone as far as to suggest that the concept of indigenous people living in voluntary isolation is a construction of activists determined to block hydrocarbon investments (Garcia, 2007). As appalling as such arguments might be, it is hardly surprising that authorities should seek to undermine the legitimacy of claims for indigenous territory or simply refuse to grant new territory in areas of potential extractive industry expansion. To bestow legal recognition on indigenous territories, and give their governing organizations the power to manage environmental resources, may be among the most serious complications that the expansion of mining and hydrocarbons has to confront.

The two most contentious topics surrounding debates on the implications of these patterns are, precisely, water and indigenous territorial control. The experience to date has been that extractive industry has had adverse consequences for each. Large stretches of the upper reaches of the Mantaro River in highland Peru have been devastated (Scurrah, 2008), while oil extraction has seriously contaminated Peru's Rio Corrientes (La Torre, 1999; Goldman et al, 2007). Meanwhile, mining companies have diverted water courses in order to access the water they need for their production, leaving communities with diminished supplies. And in the worst cases, some communities and peoples have been doubly affected, by both mining and

<sup>&</sup>lt;sup>9</sup> This area has been seriously contaminated because in periods prior to the park's creation the state oil company had operated here. When it departed it left well heads open with a steady flow of oil into the soil and watercourses.

<sup>&</sup>lt;sup>10</sup> This is an interesting, almost iconic case. On election, Ecuador's president Rafael Correa went to the international community asking them to pay Ecuador compensation for leaving Yasuni's oil in the ground. This discourse continues to the present, but at the same time the government talks with companies about possible development of these fields.

<sup>&</sup>lt;sup>11</sup> In the first of three articles in the leading national newspaper *El Comercio*, bemoaning the "*perro del hortelano*" blocking all forms of development in Peru, he wrote "against oil they [activists] have created the figure of the non-contact, forest-dwelling native" (Garcia, 2007).

hydrocarbon extraction. The Weenhayek and Guarani peoples living along the banks of the Rio Pilcomayo in Tarija, Bolivia, have seen declines in water quality and fish stock (fishing is central to the livelihoods of many in these traditional communities) due to pollution from mine tailings in Potosí, at the source of the Pilcomayo. At the same time, they are now confronted by increased exploration for natural gas in their territories and are concerned about the implications that this will have for their water supplies. Indeed, in some sense the Bolivian case suggests just how serious the threats to environmental integrity within areas of indigenous occupation are because, notwithstanding the incumbency of a government committed to indigenous empowerment, the sense remains that resource extraction *blessed by the government* trumps all other considerations. Referring to a proposed hydrocarbon development in a protected area near an Original Community Territory (Territorio Comunitario de Origen), one activist commented:

I talked to the lawyer of [the indigenous organization] and he told me that there is no place for opossition because of the government and all its supporters, the colonists are against the TCO's (indigenous Territories). Now it is hard to opose the government and their oil iniciatives. It is probably harder than oposing [sic] a transnational oil company. <sup>13</sup>

## ..... and threats to territory/water?

There is one final point to be made here. It is not merely that these patterns of expansion threaten indigenous territorial integrity and water quality, nor that there are company and government strategies that evidently seek to subdivide such territory. 14 Perhaps yet more significant is that while one discourse would insist that territory and water cannot be separated, the other consistently tries to undermine any such coupling. For many indigenous and even some peasant organizations, if a territory exists, then any discussion of the management and ownership of water has to be conducted in relation to that concept of territory. Water management thus becomes inseparably linked to the governance of territory. Conversely, government and companies consistently seek to separate the two. They might do this through natural resource specific legislation that treats the resource separately from the territory, or through efforts to simply undermine territory. In either case, the effect is the same – to produce water and land as alienable commodities, rather than as parts of territory. This alienation is, of course, essential if extractive industries are to be able to acquire the ancillary resources (water, land) that they need in order to make use of the subsoil rights that the state has given them.

Decoupling territory and water can also be pursued through strategies that undermine vehicles for the governance of territory. In order to be an operable concept, "territory" has to be governed, and for this to be possible social bodies must exist that can do such governing. Thus repeatedly one encounters efforts to undermine precisely those organizations that could play such a role. Governments and companies question the legitimacy and representativeness of indigenous

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<sup>&</sup>lt;sup>12</sup> A mine owned by the twice, and now disgraced, former president Gonzalo Sanchez de Lozada.

<sup>&</sup>lt;sup>13</sup> Personal communication to one of the authors, January 24, 2009. Spelling errors in the original note. <sup>14</sup> Examples of these phenomena abound. For instance, in 2008, the Peruvian Executive tried to introduce legislation to reduce the share of a community vote required to allow sale of land to third parties.

organizations, and governments insist on granting concessions and contracts without any real consultation with organizations *even when legislation requires this*. Meanwhile many companies have encouraged the emergence of parallel organizations, or of conflicts within organizations (Ortiz, 2009; Molina, 2009; Bebbington et al., 2008). The effect of all this (who knows whether it is also the intent) is not merely to weaken organizations, but also to undermine the idea of territory as legitimately governable. This again has the effect of decoupling resources from territory, and so facilitating the transferability of water and land and their transformation into commodities.

### **B.** Federation and contestation

The fact that expansion of extractive industry has induced organizational responses within indigenous and campesino society is hardly surprising given that, as Marlon Santi notes, concessions are disproportionately given in the subsurface of lands that are occupied by these peoples. These organizations – new and refashioned – play various roles: they lead protests; they pursue legal and advocacy initiatives; they serve as points of contact for government, companies and international activists; they engage in public debate on extraction, environment and development seeking to project alternative views of these relationships; they try to generate knowledge; and much more. There is insufficient space here to explore each of these roles or to describe all the differing forms of organization through which populations seek to give voice to their concerns regarding environment and territory in areas of extraction. 15 Instead we focus on two levels of organized response – the national and the regional 16 – and in each instance pay particular attention to responses in which indigenous and community based federations and confederations occupy a central stage. At each level, however, we suggest that most responses – and certainly the most effective ones – involve some form of alliance and collaboration between such federations and a range of other non-indigenous organizations.

At a national level, the effects of extractive industry have been addressed for the most part by existing indigenous confederations: CONAIE, ECUARUNARI and CONFENIAE in Ecuador, AIDESEP in Peru, and CIDOB and CONAMAQ in Bolivia. These confederations emerged in earlier periods in order to address invasions and injustices visited upon indigenous populations. As their activities evolved, a notion of territory began to suffuse their approaches to the relationship between environment, development and indigenous peoples—sooner in the Amazonian lowlands, later in the highlands. Territory was a concept that simultaneous resonated with ideas of history, resource governance and some degree of autonomy and self government. Ideas of territory inspired the notion that – for reasons of history and of rights – indigenous peoples should govern environment/development within the spaces that were historically their ancestral lands. This has often led to difficult relationships with hydrocarbon and mining companies, as organizations have insisted that they should have the right – on the grounds that this is their territory – to determine if, how and when extractive industry should occur. This has often placed them in stark confrontation with central

<sup>&</sup>lt;sup>15</sup> For cases see: Cidse/ALAI (2009); Broederlijk-Delen (2008); Sawyer (2004); Bebbington (2007); Ortiz, 2009; Molina, 2009.

<sup>&</sup>lt;sup>16</sup> We use "regional" to refer to areas that are subnational, but larger than single municipalities.

government that views the subsoil as the dominion of the state, a resource whose use should be determined on the basis of national priorities and majority needs, not local demands.

In some instances – such as that of Sarayaku in Ecuador – this has led to years and years of stand-off between coalitions of national and local federations, on the one hand, and alliances of state and industry, on the other. In other cases, it has elicited more or less explicit strategies on the part of industry and government to undermine and divide these organizations through bribes, special favours or the simple creation of parallel organizations (Sawyer, 2004). Indeed, there is no doubt that at certain times both local and national organizations have been severely weakened as a result of such interventions (Ortiz, 2009; Molina, 2009).

While these arguments were first elaborated around the extraction of hydrocarbons, they have been re-rehearsed around the more recent moves to expand mining – and given that mining occurs primarily in the highlands, this has brought federations such as ECUARUNARI into debates on extraction when previously they were far less visible in this area. Indeed, in some sense the mining debate has helped to revitalize some of these organizations, allowing them to recover somewhat from divisions previously created by efforts to divide them (as well as by opportunistic and self-serving behaviour on the part of some of their leaders).

The exception to these patterns is the National Confederation of Mine Affected Communities in Peru, CONACAMI. CONACAMI is a relatively young organization, emerging in the late 1990s with the specific purpose of representing communities affected by mining expansion. Though initially created as a *coordinator* of these different affected groups, it soon assumed the mantle of a confederation with bases in regional federations (CORECAMIs). It addresses issues of indigenous rights and resource governance, and pushes above all for formal recognition of the right of communities to free, prior and informed consent before mining can proceed. It also lobbies for the establishment of participatory regional and environmental planning processes prior to the granting of any concessions. In pursuit of these ends its tactics have been many and various: from pursuing legal actions and international arbitration in conflicts, through to direct action, public protest, and participation in processes of dialogue and negotiation. For a young organization CONACAMI has achieved a great deal. Above all, it has helped make the effects of mining on indigenous territory, resource management and livelihoods, a topic of vigorous public debate, and has gained great national and regional visibility in the process (Bebbington, Scurrah and Bielich, 2008).

Of particular interest is that CONACAMI (along with ECUARUNARI of Ecuador) has also led an initiative to create a coordinating body of national indigenous organizations in the three Andean countries – the Coordinadora Andina de Organizaciones Indígenas. This reflects CONACAMI's own move towards ethnic-based politics, a process in which its leadership began to understand the organization as explicitly indigenous. While this has created tensions within the organization – because a good number of its bases do not share this view – it has also helped to reframe some of the ways in which CONACAMI presents the problem of extraction and the environment in Peru. Increasingly, the organization has viewed this relationship as a *territorial* problem, rather than a sectoral one. In some sense, then,

the experience of extraction has taken CONACAMI along a path leading towards positions already elaborated by the other indigenous organizations.

While national confederations such as these have played important roles in making the effects of extraction a topic of national debate and political discourse, their roles in specific local conflicts over mining, water and natural resources, as well as in efforts to manage these resources, have been far more modest. These more localized initiatives for territorial control and the defence and management of natural resources have instead been led by supra-communal coalitions of membership groups, sometimes organized as formal Federations, Unions or Associations, sometimes as less formally networked groupings (Bebbington 1996, 1997). To Some such coalitions emphasize issues of defence and resource rights, others lay more emphasis on resource management for production, but, whatever the case, they play key roles in any initiative to question externally-driven resource management initiatives (such as extractive industry projects). They do so because they have closer relationships with (parts of) the local population, and because their own "representativeness" adds legitimacy to any such processes of questioning. Indeed, it is hard to imagine that a process involving only NGOs<sup>18</sup> could gain much traction in debates on extraction and water, precisely because the NGOs would be dismissed as unrepresentative outsiders.

By the same token, however, supra-communal groups acting alone often have little leverage. Limits on their financial resources, comparative experiences, information base, ability to generate and frame knowledge for public debate, links to national and international entities and the like all constrain their capacity to make a difference. Thus it is that in most cases of dispute over water and extraction, one encounters alliances of one sort or another that bring together membership, non-profit, church, local government and other groups. Patterns vary from territory to territory. In some instances, one encounters "Defence Fronts", semi-formalized, citizen-based, representative coalitions. In other cases, the situation may be more akin to a working group of different types of organization, collaborating with each other on the issue at hand, but not bound together in any formal sense. In yet other cases, coalitions are led (and often dominated) by large international or internationally connected national conservation organizations whose proximity to power, policy makers and the media often gives them the capacity to exert important leverage. 19

One important dimension of such alliances is how far they bridge rural-urban differences. Water issues – affecting as they do medium- and large-scale settlements as much as rural communities – have the potential to link rural and urban mobilization in ways that purely territorial or other issues do not, precisely because these latter are of very little urban interest. Indeed, in many cases where grassroots action has forced new debates on the extraction-natural resource-water relationship, this has been because the action was based on an articulation of countryside and town (and often local government) which gave more leverage than purely rural action and

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<sup>&</sup>lt;sup>17</sup> Libia Grueso, Colombian activist, has referred to these as coalitions of *los dolidos* (the hurt ones), those persons directly impacted and harmed and without whom there could be no effective campaign to confront the adverse effects of extraction.

<sup>&</sup>lt;sup>18</sup> Though see the caveat at the end of the following paragraph.

<sup>&</sup>lt;sup>19</sup> Though at the same time these close links to power and money have often led these organizations to assume more politically cautious positions for which they have been severely criticized at times (Chapin, 2004).

organization ever could. Examples here include the (so far successful) efforts to prevent mining in the *canton* of Cotacachi in the Ecuadorian sierra, and the (also so far successful) attempts to protect Mount Quilish in Cajamarca from mineral development on the grounds that it is the departmental capital's main source of water (Bebbington et al., 2008).

That said, to sustain such coalitions is as difficult as it is important. The differences between urban and rural priorities in other domains, as well as ethnic and class differences, present a real challenge to those leading such coalitions – and in particular to leaders of supra-communal organizations. Indeed, this is a more general point. Differences within organizations, and the more so within social movements, are a recurrent source of cleavage and weakness. Simply within rural, supracommunal federations and associations one encounters differences in economic interests, political party affiliation, environmental endowments etc., as well as (often deeply embedded) local disputes among families and neighbouring communities over boundaries, the use of common property and so on. Likewise, one can encounter more distance than one would hope between leaders and bases, with leaders sometimes coming from local power-blocs that seek to use the supracommunal organization for their own ends as much as for collective purposes. Companies and governments are, of course, well aware of such weaknesses and cleavages, and are not averse to cultivating and deepening them. Nor is opportunistic behaviour in short supply - in disputes over extraction, natural resources and territory, federation leaders have not infrequently accepted payments from the extractive industry, the end result being weakened organizations, split coalitions and (often) extractive industry success in securing control of the water and other natural resources it needs. We have reported on cases of this in Cajamarca (Bebbington et al., 2008); Ortiz (2009) notes something similar among indigenous federations in lowland Ecuador, as does Molina (2009) in Bolivia. While each of these three accounts remains highly sympathetic to such forms of organization, they also draw attention to their potential fissures and self-destructive tendencies.

## C. Mining, water and rural organization in Piura, Perú

While Piura is not (yet) a mining region, over the course of the last decade two of Latin America's most iconic conflicts over water and mining have occurred in the department. The conflicts reveal much about the roles played by supra-communal organizations in affecting relationships between mining, water and territory, as well as about the potentials and limits of these organizations as they play these roles. The first conflict occurred in an irrigated, agricultural export-oriented valley centred on the town of Tambogrande, the second in the far poorer highlands of Huancabamba and Ayabaca (see Figure 2).

In the late 1990s and early 2000s a junior Canadian company, Manhattan Minerals Corporation, sought to bring a gold mine to approval in the town of Tambogrande and surrounding areas.<sup>20</sup> The conflict that ensued was especially acute because it pitched mining directly against human settlement and export agriculture. The mine would have required resettlement of much of the town and parts of the rural population and

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<sup>&</sup>lt;sup>20</sup> The following three paragraphs draw on Bebbington 2008.

would have damaged a zone of successful, export-oriented, high value, irrigated agriculture that had emerged as a result, *inter alia*, of earlier World Bank investments in water supply and management.<sup>21</sup> The case thus lent itself to clear dichotomies: a private investment undermining an earlier successful public investment; a mineral development landscape undermining an export-oriented landscape that appeared both more economically valuable and more inclusive in employment terms; a mine site displacing people from their homes; and an example of a territory being submitted to contradictory development paths each proposed at different times by the same World Bank group.

The conflict escalated quickly and became violent. The main leader of the coalition opposing the mine was murdered, and further escalation seemed only to have been avoided through the implementation of a local referendum to determine the future of mining in the area. This referendum was organized by the local government and supported by national and international nongovernmental organizations, and enjoyed a turnout of some 27,015 people, roughly seventy three percent of eligible registered voters. The result was that 93.85% voted against mining activity in Tambogrande and 1.98% in favour, the balance being abstentions, spoiled ballots etc.(Portugal Mendoza, 2005). This model – of the public referendum on mining – has since been proposed and used by social movements and activists in Argentina and Guatemala as part of their efforts to halt mining projects.

The fact that contemporary land use in Tambogrande is still dominated by agriculture and the prior urban settlement grid, and not by an expanding mining sector, can only be explained by the emergence of a social movement that culminated in this public consultation. But how did this movement emerge and achieve what it did? At the core of its success was the fact that it grew from, and succeeded in building, bridges across a number of distinct social groups in the region. In particular, it built bridges across rural and urban groups (as both populations had much to lose), and also among both small and large export-oriented farmers (again, as each came to perceive that it had much to lose). In the process it also brought local government into the movement, an involvement that was critical as it was this government that had the powers to convene the referendum. Just as importantly, though, this movement built links with actors in Lima and beyond. As the process unfolded, activists in Tambogrande gained the support of a group of Lima-based advisors (organizations and individuals) who operated as a technical committee to Tambogrande's social movement. The committee provided information, helped with the studies that argued that Tambogrande would be more economically productive as an agrarian landscape than as a mining one, helped with legal issues and assisted in designing the referendum. They also played important roles in making links to international actors in North America and Europe, not only for advice but also for financial support – and in particular to fund the referendum. Absent any one of these groups, Tambogrande's current landscape would likely be an emerging mineral landscape.

Just as the stand-off between the population of Tambogrande and Manhattan Minerals was coming to an end, another conflict began to unfold in the highlands of Piura in the provinces of Ayabaca and Huancabamba. A subsidiary of the then UK-based

<sup>&</sup>lt;sup>21</sup> Our thanks to colleague and friend Bruno Revesz for some of these insights. See also Cleaves and Scurrah (1980).

mining company Monterrico Metals<sup>22</sup> began efforts to initiate exploration in a set of concessions that it had recently acquired from other companies in the belief that beneath the soil lay a world class copper-molybdenum deposit. The existence of this deposit – referred to initially as the Majaz project and subsequently as Río Blanco - has since been confirmed, and is part of a far larger copper belt stretching from northern Peru into the southern and eastern provinces of Ecuador.

Monterrico's concessions existed within the territory of two formally constituted communities. These communities – Segunda y Cajas and Yanta – are unusually large, including both rural and semi-urban settlements, and are more *campesino* than indigenous in their cultural and organizational form. Indeed, the scale of the communities means that the levels of organization at which most routine governance is conducted are the *ronda campesina* and the local settlement. The *ronda campesina*, an organizational form that has been particularly strong in neighboring Cajamarca (Starn, 1999), emerged as a community-based mechanism for policing against cattle rustling, but over time has become a more general vehicle for the administration of local justice, the governance of the public sphere (including during Peru's internal conflict: Starn et al., 1996) and, increasingly, the regulation of everyday life (Diez, 2007). In practice, the *rondas* assume many of the functions of the community at a local level. These *rondas* then exist in federated form at the level of the provinces, a level at which they exercise significant social and political influence, intersecting inter alia with municipal governance processes.

All this notwithstanding, the existence of legally-recognized communities means that the expansion of mining activity in the area has to be in accordance with legislation specifically related to the *comunidad campesina*. This presents the company with the need to gain agreement from two-thirds of community members, in a notarized community assembly, before it can go ahead with activities. This in itself is a complex task, given the size of the community, and the company's own determination to move quickly. These factors, coupled with the company's poor understanding of local dynamics and willingness to cut legal corners (a willingness with which the Ministry of Energy and Mines was complicit: Defensoría del Pueblo, 2006 a,b; Red Muqui, 2009), led the company to proceed with activities without securing this agreement.

For reasons that go beyond the scope of this chapter, this led to a situation of increasing tension and ultimately violence in which two people were killed, several maimed and injured, and in which levels of everyday insecurity increased (Bebbington et al. 2007; Revesz and Diez, 2006). In these confrontations, the *rondas campesinas* led efforts to prevent the mine from going ahead. In the process, however, many more actors also become involved in a broad, albeit uneasy, coalition questioning the *modus operandi* of Monterrico, and the desirability of the proposed mine. Local mayors – depending on who was in power – aligned themselves with these efforts, as did many of the departmental and national organizations who had been involved in the Tambogrande conflict. Meanwhile, on the pro-mining side a similar convergence occurred – notwithstanding the fact that a number of private and government actors in the sector had certain reservations about Monterrico's behaviour. Indeed, the sense was that this has been a replay of the Tambogrande

<sup>&</sup>lt;sup>22</sup> It has since been acquired by a consortium of Chinese companies who own the majority of its shares – most of the remainder are owned by a South Korean company.

struggle in which the mining sector is determined to use the project to open up Piura to mining, and the campesino and social movement sector is equally determined to stop this from occurring.

Once again, different arguments were mixed together in the efforts of the federations and their allies to stop the mine. Implicitly, one senses that the determination to protect "territory" and the power of the local population to govern this space has been a key motivation. Of almost as much importance – and of *more* importance in the public explanations of the reason for protest – have been concerns about the implications of the proposed mining project for water resources. Generally these arguments are pitched more at a regional level than at a community level. Stated concerns include:

- the fear that contamination from the mine would run into local rivers that pass through areas of certified smallholder organic coffee production and so lead to the loss of certification;
- the fear that seepage from tailings would lead to local contamination;
- the belief that the mine would use large quantities of water that would not only diminish local supply within the provinces but also compromise water running to the western arid lowlands where export agriculture depends on irrigation from the highlands;
- the belief that open pit mining and the removal of hilltops would likewise compromise water quantity.

Casting arguments at a regional level has also been important (and in some measure a conscious strategy) for building links beyond the locality, and thus facilitating alliances with other actors who might otherwise have had little interest in a conflict occurring in distant *comunidades campesinas*. This argument has also – perhaps for these same reasons – been thoroughly contested by the mining company which has insisted that the *rondas* and, above all, the activists and organizations that advise them simply have their hydrology wrong and do not understand either the ways in which modern mining can avoid contamination, nor the structure of the regional drainage system. The company insists that its activities could not possibly affect water running to feed coastal agriculture and towns, and has been supported in this assertion by nationally eminent ecologists, one of whom has subsequently been named Peru's first Minister of the Environment.

Given that the company involved was registered in Britain, and because of the violence and claims of human rights abuses in this case, British solidarity groups also became involved in this conflict (in particular the Peru Support Group [PSG] and Oxfam-GB). One effect of this was that the PSG organized a delegation to document the case.<sup>23</sup> The delegation's report argued that while the mine was likely correct on the issue of drainage basins, the proposed project raised a series of important issues for water quantity and quality. Acid mine drainage effects had the potential to be significant; tailings and dams would be located in tectonically active areas; high levels of rainfall significantly increased the possibility of catastrophic slumping of tailings; the potential for contaminated surface runoff and subsurface drainage was high; and

<sup>&</sup>lt;sup>23</sup> Anthony Bebbington led this delegation, which also included a hydrologist, an anthropologist, a leading international journalist and a British Member of Parliament (see Bebbington et al., 2007).

the mine was proposing technologies that had not been previously used in Peru (Bebbington et al., 2007; Bebbington and Williams, 2008). The report also argued that while the single mine might not affect water running to the Pacific, there was evidence to suggest that the company had it in mind to develop a far larger mining district which *could* affect west-flowing water. Red Muqui, the national network of NGOs working on mining, human rights, environment and development has since referred to the PSG report as a *hito importante* (important milestone) in the conflict (Red Muqui, 2009) in that it brought together a large body of information in one third party report, played an important role in making the case the object of more visible public debate and suggested that the unit of discussion should not be the single mine but rather the mining district.

While the report was not a product of the federation of *rondas campesinas*, it could not have been produced without their existence (nor the NGOs and church groups supporting them). In that sense it was a product of the sort of alliance we discussed in the prior section – one grounded in the existence of local federations but neither limited to nor entirely controlled by these federations. Similarly, the subsequent evolution of the conflict hinged around the existence of these federations. In some measure this evolution followed the path charted by Tambogrande in that within a year of the report, the alliance resisting mining in the region had also held a local referendum. While the technical organization of the referendum was in large measure the work of the national and international organizations within this alliance, the information provision and mobilization required to inform rural people of the referendum and get them to participate in it, was the preserve of the federation of *rondas* and local authorities.

The referendum concluded in a 92 % vote against the Rio Blanco Project. Though legally non-binding and immediately dismissed as not-relevant by the government (Burneo, 2008), its effects have been significant in that at the time of writing the final proposal for the mining project has still not been presented to the government for approval. As the recent global economic crisis has begun to influence the mining sector, the project's new owners have intimated that its onset may be delayed yet further (Reuters, 2009). If this were the case, it would give federations and their allies more time to work through their arguments and their proposals for development alternatives for the region. Indeed, this is the biggest challenge – for as long as federations are unable to link any arguments they may have about water and territory to a clear case as to why non-mining use of the land might be more effective in fostering regional growth and reducing poverty in the area, then the political purchase of their case remains limited. Without such well grounded proposals for local development alternatives, the pro-mining sector will continue to argue that activists and federations merely want to keep people poor and to frustrate economic growth in Peru. Whether justified or not, such arguments resonate widely.

### D. Conclusions

We write this chapter at a time of worldwide financial crisis, one of whose consequences is that rates of investment in extractive industries will be far less aggressive than they were just a year ago. Mineral, oil and gas prices have all fallen

dramatically,<sup>24</sup> and a number of companies have noted that they will be reviewing their projects, and possibly putting some on hold. This may mean that the immediacy of pressures on water resources noted earlier will diminish in the coming years. There is good reason to doubt, however, that this diminution will be long-lasting. Given that much of the demand for the products of the Andean subsoil, and in particular for minerals, came from the Chinese and Indian economies, the underlying drivers of expansion in extractive industry have not gone away.

In the face of this, a simple look at the maps presented in the first section would suggest that by far the most important challenge facing water resources and indigenous territory in the Andes-Amazon region is to introduce a degree of rationality into the regulation and planning of extractive industry. At a minimum, regulation must ensure that extractive industries and water resource management are treated as joint issues – as opposed to the current situation in which water questions are treated in a derivative manner. As has been suggested in many of our interviews with indigenous and *campesino* leaders, the current systems that repeatedly prioritize extraction imply that ministers and presidents believe that gas and copper are more important than water.

The existence of so much conflict and mobilization around these relationships between extraction, water and territory, and the need for indigenous and campesino groups to federate and build alliances simply in order to continue living as they have long lived is also a reflection of the absence, or at least failure, of regulation. Conflict occurs neither because of the action of "cuatro pelagatos" ("four nobodies") as Ecuador's president Rafael Correa suggests (Moore, 2009), nor because rural leaders are terrorists and environmentalists are former communists turned green, as Peru's president Alan Garcia and parts of the Peruvian legal system have suggested (Garcia, 2007). Instead, it occurs because communities ultimately conclude that formal democratic and bureaucratic procedures simply don't allow them to express their concerns (far less receive any response to them), and also because formal political parties fail to channel these citizen concerns. Protest, federation and mobilization are default phenomena, a consequence of weak, inoperative or corrupt institutions. And lest it be assumed that having an Aymara President necessarily resolves this situation. we need only refer back to one of the cases noted earlier in the chapter: the Bolivian government's apparent willingness to endorse gas exploration by a transnational firm on a massive scale inside a protected area that not only infringes claimed (if not recognised) indigenous territory, but also threatens what is deemed to be the main source of water for both rural and urban settlements in an arid and ecologically fragile region. Notwithstanding claims that one can trust the State because its approach to the subsoil will be informed by a respect for Pachamama, 25 it would seem that the part of Pachamama that has been deemed most worthy of respect is that which is best able to generate resources for public investment and macroeconomic stability.

To change the rules of the game *as well as* the culture that underlies both the practice of government and the exercise of executive power is a huge challenge. Grassroots federation is a very important element of responding to this challenge, and protecting

<sup>&</sup>lt;sup>24</sup> Gold is so far something of an exception.

<sup>&</sup>lt;sup>25</sup> Claims made to the first author by Bolivian MP and President of the Congressional Committee for Constitutional Affairs, Renee Martínez, in response to a question during a public forum at the conference "Latin America 2008: making a better world possible", December 6<sup>th</sup>, 2008, London.

the natural resource base of rural and indigenous community and livelihood in particular places. However, it is very far from being a sufficient vehicle for changing both the rules of the game and the ways in which this game is played such that indigenous and citizen rights of access to water, resources and self-governance are guaranteed. Even constitutional change may not be enough – the protests occurring in Ecuador do so in response to a new law that indigenous and other organizations claim allows forms of mining that will threaten the sanctity of water resources. Yet this occurs just four months after the country approved a Constitution that is supposed to give Nature enforceable rights, and recognize access to water as a basic right of citizenship. Whether these organizations are right or wrong in their interpretation of the law, the determination of the Ecuadorian Executive to push the legislation through without consultation, while writing off CONAIE as irrelevant, suggests that constitutional change, no matter how apparently progressive, will do little to protect water rights while cultures of power continue to be inflected with authoritarianism and while Nature continues to be automatically subsumed to "Economy" in the name of fiscal imperative.<sup>26</sup>

The issue of protest and rural social mobilization around water and natural resources is, then, a pointer to challenges that are much greater: of state formation and public culture. The challenge of the apparent slippage between constitutional assertion and executive fiat in Ecuador is one of State – the absence, so far, of institutions of the state that are sufficiently strong and independent that they can protect rules from executive infringement. The cultural challenge is one of shifting the balance of conviction in society such that such state making is demanded by a populace and such that the values of certain rights and resources are deemed non-negotiable, no matter the fiscal imperative. And in this regard it is important to close on a note of optimism. Furthermore, this is optimism that comes from Peru which might be considered, by many accounts, the least favourable of the three countries for the protection of both indigenous rights and water resources in the face of extractive industry.

One of the jewels of the Peruvian state is the Ombudsman's Office, the *Defensoria* del Pueblo. The Defensoría is charged with ensuring that government action and policy do not infringe citizenship rights as enshrined in Peruvian law and commitments to international treaties. The *Defensoria* has played a critical role in a series of conflicts around indigenous and rural people, water and extractive industry –

<sup>&</sup>lt;sup>26</sup> The issues at stake here are, of course, yet more complex – and the Ecuadorian case is an illustration of just how complex. Following the discovery of oil in the 1960s, Ecuador built up social and development programmes on the basis of income from hydrocarbon extraction, and subsequently from loans leveraged against anticipated future income from oil. This was, then, a transfer from natural resource extraction to social investment. As oil income has declined – for both supply and price reasons – Ecuador's government needs alternative sources to fund social programmes. In the process it has looked once again to resource extraction, this time mining, to fill this gap. In each instance, then, social programmes are to be funded through economic activity that threatens water resources on or around indigenous territory. This elicits protest. Yet it is also the case that the same indigenous confederations protesting against extraction also protest against efforts to increase the retail price of gasoline, and against cutbacks in social programmes. In this sense, indigenous confederations are also far from consistent in these debates about exactly how Ecuador wants to manage its resources. Not so dissimilar slippages are also apparent in Bolivia where actors who played an important part in the Guerra del gas in 2003 were by 2005 part of a governing coalition that, notwithstanding a rhetoric of nationalism, is now allocating contracts to transnational hydrocarbons companies with less than responsible histories of behaviour in indigenous territories elsewhere in the world.

much to the annoyance of different parts of the government of the day. It has attempted to play the role of state to which we have just referred, and also to challenge public culture (for it has also assumed an important educational role in the media). As such, in a range of conflicts over extraction and water it has been the one part of the state from which federations and broader alliances have been able to elicit responses and in which they have had confidence. That said, the emergence of such a position in the Defensoría must itself be understood in the context of those same federations and alliances – for it is in some sense a partial product of them. First, the ability of the *Defensoria* to do this work has been made possible because of supplementary funding (which in 2007 covered over half of its total budget) received from donor organizations that have also supported some of the alliances and mobilizations discussed earlier. Second, the disposition of the *Defensoria* to act on these issues has emerged because of the nature of its staff which is increasingly composed of young, well-trained lawyers who are committed to the ideals of their profession rather than to partisan projects, and a sub-group of whom are particularly committed to the issues raised by socio-environmental conflicts. Third, the Defensoria must act on issues when requested to do so - in many cases formal requests made by federations and their allies to investigate cases are the triggers that have brought the *Defensoria*'s very really professional capacities and public legitimacy to bear on these issues of extraction, water and rights.

The case of the *Defensoria del Pueblo* in Peru illustrates the vital role that competent, autonomous and legitimate public institutions have to play in guaranteeing and protecting community rights, including the rights of access to water, territory and a healthy environment. It also reminds us that the challenge of institutional change, of more rational regulation, and of state making is one that goes beyond what federations and their allies can achieve through their particular actions around water and extraction. It is not, however, independent of them: indeed, such actors have a critical role to play in bringing a more rational, rights-oriented state into being. The challenges to these actors, however, is to realise that this is indeed one of their most critical roles, to work out how best to play it, and to find those parts of the existing state through which they might be effective in doing so.

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