

An Analysis of Neoliberal Policy for Water System Management

Introduction

Freshwater is a crucial natural resource for life function. Unlike resources like oil that have alternatives, water does not. It is the only option to keeping people alive. Although water may seem infinitely plentiful in developed countries, demand is increasingly exceeding supply. On a global scale, it is necessary to ensure that the management systems govern water in a way that is acceptable for all stakeholders and keep it as a human right.

On a planet characterized by enormous oceans, less than 3% of the planet's water is fresh, but two-thirds of that 3% is trapped in ice. This leaves less than 1% of the world's water that is accessible, but less than 1% is actually potable due to pollutants (Rogers and Leal, 2002). At the same time, water use is increasingly exceeding supply, which means more water is consumed than can be replenished. It is estimated that by 2025, demand will exceed existing supplies by upwards of 56% (Finnegan, 2002). In many cities across the globe, recently notable in Cape Town, the day when water runs out completely is looming (Maxmen, 2018)

In many developing nations where economies have less capital at their disposal, water infrastructure has been constructed to bring water to the people, but there are ingrained policy failures that change the definition of water accessibility. Some governments have adopted neoliberal agendas surrounding water, which means they have devolved power to private organizations that then sought to commoditize the resource (Finnegan, 2002). This occurs due to the profit-motivation private companies have; they want to make money.

Beginning in the 1990's, the understanding of water as a human right became widespread. In fact, at the United Nations International Covenant on Civil and Political Rights in 1966 outlined that in "no case may a person be deprived of its own means of subsistence" ("International Covenant on Civil and Political Right", n.d.). This means that

people must have uninterrupted access of food and water in a way that is affordable and accessible. While this view was widely accepted by the 1990's, governments in developing nations began to employ neoliberal management styles. While neoliberalism had potential, the execution was flawed in many nations. The biggest consequence coming from this specific type of neoliberalism was the advent of water commodification; there was often a lack in guidance on how private holding groups would price the water. The ethics behind intentionally commoditizing water are questionable as it can price water service out of affordable range for many customers. This has been especially troubling in impoverished cities in Latin America.

Much of the reason why neoliberal agendas surrounding water service management has occurred is due to World Bank advocacy for private corporation participation in the management of water in order to generate income (Goldman, 2007). This neoliberal agenda is compelling in theory. The motions to bring services under a private, taxable entity have benefits, like increased tax revenue and a lump-sum from the sale to a private company. Despite this, neoliberal agenda regarding water management has been a source of sociopolitical unrest due to commodification of the water. This type of policy begs the question: who can have access to this scarce resource, and why must it continue? Through an examination of World Bank policy, a case study from a Latin American corporation, and an analysis of the techno-political ramifications of these implementations, the fallacies in this political ideology will be brought to light in an effort to question its perpetuation and to advocate for an improved agenda.

Literature Review

The World Bank serves as a global financial institution that provides monetary aid to states in need; this is accomplished through loans and expertise given to help fledging

markets. (Agostino, 2008). The World Bank's mission, according to the World Bank themselves, is "to end extreme poverty... and to promote shared prosperity" ("Who We Are", n.d.). Beginning in the late 1990's, the World Bank began to tie neoliberal service administration, especially water systems, with their financial aid packages. Their goal was that the principles of a free market for utility service administration would help developing countries earn additional wealth.

The World Bank specifically targeted water services. According to Agostino (2008), the World Bank believed that private financing of water management would allow for the systems to be modernized quickly to expand and improve service, and ultimately bring fresh water to millions of people for the first time.

It must be noted that the World Bank is made up of people generally from the developed nations of the northern hemisphere, whose understandings of economics and finance come from their western perspective in developed nations. This explains their motion towards adopting a neoliberal agenda as they do not have a true understanding of the political-economic tone in developing nations (Perrault, 2006). The idea behind the move towards a neoliberal initiative is to give the indebted government a means of increased income through a lump-sum from initial service sale as well as the ability to impose taxes on the private company. This became the World Bank's stance come the 1990s in an effort to help develop global economies.

Neoliberalism gained much attention in the global theater during the 1970's and 1980's, where the conservative administrations headed by Ronald Reagan and Margaret Thatcher began encouraging countries to allow economic stimulus through foreign investment. In an homage to classical liberalism of the seventeenth century, neoliberalism follows many similar traits like laissez-faire economics where the principals of capitalism and free market, rather than government sponsored aid packages, to bolster wealth (Coleman,

2012). Neoliberalism is a distancing of private sector business from the government. The value proposition that these agendas bring is that the private sector has the capital to drive efficient distribution of goods, which in turn inspires economic development and overall societal improvement (Castro, 2008, Coleman, 2012).

Especially in Latin America, this type of neoliberalism has been employed with varying levels of success. One of the first examples began in Argentina in the early 1990s. As Ramamurti (1997) points out, after Argentina went into credit default due to the Falkland Islands War, Carlos Menem's administration broke up *Ferrocarriles Argentinos* – the national railroad body – and sold that off to many foreign private holdings. This ended up being a complete failure as two-thirds of the nation's railroads had closed by 2000; railroads were not profitable (Ramamurti, 1997). While the taxation on the newly formed private groups helped the Argentine government put the country back together in the short-term, the nation learned that some industries need centralized, government investment in order to keep afloat. This initial failure occurred in conjunction with the development of the new World Bank policy.

With this initial skepticism at hand, let's look closely at the water policy that the World Bank put on the developing world. It is important to know that neoliberalism can present itself in many different ways and with different focuses, but the overarching theme of laissez-faire government remains. The World Bank pushed this agenda on nations focusing on public utility services. In order to do that, the World Bank began to employ a system of conditional loans, by which a monetary loan to a nation would be dispersed *if and only if* the recipient nation devolved publically owned entities to privately-owned groups. Goldman (2007) analyzed how the World Bank was able to spread this agenda so effectively – “a ‘highly indebted poor country’ [could not] borrow capital from the World Bank... without a domestic water privatization policy as a pre-condition.” This was a blanket statement for how

the World Bank would allocate funds, and this led to a ten-fold increase in the number of people that became dependent on private water firms between 1990 and 2000 (Goldman, 2007).

Before going forward, it is important to understand the complexity of neoliberalism. The United States can be considered to have a neoliberal economy, but the neoliberal economies of Latin America operated much differently. Namely, the private holding groups of utility services under the World Bank's agenda were largely foreign-owned, which meant there was foreign control of a single company and industry. In the United States, foreign investment to that scale causes major backlash; this happened in 2018 when a Chinese company was looking to buy tech-giant Qualcomm (Li and Zhong, 2018).

While the devolution of water to private companies brought foreign investment into the affected municipalities, it also largely commoditized the water itself. Instead of viewing water as a human right, it became a tradable resource with profit as the goal. As Spronk and Crespo (2008) point out regarding a situation in Bolivia, a city's water system became under the exclusive rights of an American holding company, along with Italian and English investors. This was not an isolated case; many holding companies from developed nations became the sole arbiters of water in many places that chose to adopt neoliberal policies. The most notable firms were Suez and Vivendi, two French firms that dominated about 70% of the global private water markets (Goldman, 2007). What's even more interesting is that depending on the national laws, many of these companies inherited exclusive rights to all water – including rain water – in that jurisdiction (Finnegan, 2002, Perrault, 2006). For many customers, the change to a neoliberal style of management made getting water for consumption considerably pricier; since water is something that everybody needs, having such a high price tag leverages profit due to human need.

Despite the intentions of privatization lying in the desire to modernize systems and bring economic stimulus, the systems often failed to do so equitably. In a bottom-up analysis of the politics of water systems, Bakker, et al (2010) show how private companies fail to consider the poorest people in society. In many places with private administration of water services, the wealthiest areas are always the first and foremost to receive water connections and have the best services. This article goes through many cases in which the poorest people in cities spend the most per-volume on water. Bakker, et al (2010) goes through how priorities are set, which end up bringing the best quality of water service to the wealthy, which leaves the low-income populous marginalized.

Although there had been continuing pressure to adopt neoliberal policies for water service management by the World Bank, by the close of the 20th century, many foreign investors became wary of the use of neoliberal agendas for water management. Many saw the opportunity to manage a water system as a great way to make enormous profits, but that sentiment began to wane. As Bakker (2013) noted, companies learned that the needed capital investment was much higher than anticipated, and that the rates of return on investment were begrudgingly slow. There was also considerable risk involved, as the state-of-affairs in some nations were volatile. Additionally, many customers could not afford to pay for water service with the novel service improvements priced-in. Through the entirety of the analysis presented by Bakker (2013), the long-term economic drawbacks involved with a neoliberal initiative involving service companies became self-evident. This questions as to why this agenda is still something that people advocate for, and has backing by international financial groups?

Although there was incessant backlash in places with neoliberal agendas having unintended consequences when it comes to selling once public utility companies to the private sector, advocacy for the implementation of this type of neoliberal agenda has continued. Karunanathan (2019) discusses how neoliberalism is still very active among the

World Bank community. Since water is very scarce and so many multi-billion dollar industries have massive pull, the World Bank's International Finance Corporation, along with private corporations including Coca Cola and Nestlé, advocate for neoliberal holdings of water and to be wary of "human rights mechanisms [that] have the potential to disrupt." This type of neoliberalism discussed here is nuanced, though. It is not the same as devolving a once public utility provider. Instead, these companies have it in their interest to keep water usage away from government scrutiny; it allows them to keep producing with consumers in ignorant bliss. This is similar to Latin America in that it is motion for less government. Although many states have been drifting away from neoliberalism, it still remains a part of what defines the World Bank; this once again asks: why?

It is obvious that there are many issues with the use of neoliberal policies to shape water management systems. This is especially true for Latin American countries. In a very similar manner to how Von Schnitzler (2008) and Williams (2018) uses technopolitics to analyze implementations of neoliberal agendas across the globe, water sociotechnical systems of Latin America will be analyzed in order to see how neoliberalism fails, and in order to formulate a favorable solution.

Case Study: The Bolivian Water Wars

In order to show how the neoliberal agenda perpetuated by the World Bank is not the ideal method for water system management, an analysis of the intertwined politics of water in the Bolivian city of Cochabamba circa 2000 will be used. In this case, the main stakeholders are the city officials, the national government that authorized the change in authority, the private company, and the populous.

It all began on October 22nd 1999 when the neoliberal Bolivian federal government passed Law 2029, laying the framework to dissolve the national water entity in order to allow

for privatization. This was done in an effort to receive financing from the World Bank. This law allowed for a private company, Aguas del Tunari (AdT), exclusive access to *all* of the water in the Cochabamba metropolitan region. This included including groundwater, well water and even rainwater. Like many non-government bodies that took private ownership of a nation's water system, AdT was a company owned by United States entity – Bechtel –with some additional capital from Italian and English shareholders (Perrault, 2006).

The specification in question is, in *Artículo 56° of Ley 2029*, (article 56 of Law 2029). It states, translated from Spanish to English, that “The EPSA [Entity Provider of Drinking Water and Sanitary Sewer Services] will charge Fees to Users, as compensation for Drinking Water or Sanitary Sewer Services.” This means that the EPSA can charge fees for water connections, which is sensible. However, the issue comes by saying, “The EPSA will have the ability to charge Fees for the provision of these Services through alternative services, in accordance with regulations.” This clause states that the private holding companies were allowed to charge for water consumption in places where connection was yet to exist through alternates, which were poorly defined (“Ley Número 2029”, 1999). AdT was able to become creative with how they could charge people.

This change in authority infringed upon the lifestyle of the Bolivians. Before privatization, there was intrinsic liberty in how *Cochabambinos* would obtain water. Their society had systems of irrigation channels that followed a traditionalist Quechua style of the Incan people as well as private wells to access free groundwater (Perrault, 2006).

This became no more; the execution of the law in the Bolivian legislature gave the entirety of the region's water jurisdiction to the single enterprise, and enforced with a government-backed non-compete agreement. Since the law legitimized AdT's full access to *all* water in the Cochabamba region, they were allowed to charge consumers for water that

had once been a free resource (Perrault, 2006, Spronk and Crespo, 2008). Otherwise, the citizens would be considered illegal competitors.

Through what was billed as a method to modernize the water infrastructure for a rapidly-growing metropolitan population, AdT was able to raise water prices by up to 35 cents, which was around a quarter of an average worker's monthly salary. Locally, though, the price was found to have increased by upwards of 200 cents (Finnegan, 2002, Spronk and Crespo, 2008). The water in the Cochabamba region became commoditized in an unintended consequence of this specific type of neoliberalism, and the ability to hydrate suddenly had an enormous price tag.

This new legislation brought fear and a lack of trust in the government. The Bolivian government had always struggled to maintain national support among its people. Once the people realized that their liberty and livelihood were at stake, they protested (Spronk and Crespo, 2008). Their demonstrations against the neoliberal agenda were occasionally violent, but impactful. After a series of national strikes, the government was forced to act in April, 2000 after months of unrest (Perrault 2006, Spronk and Crespo, 2008). Law 2029 was changed, but at the cost of unity.

An Analysis of the Technopolitics of Water

What did we learn from this neoliberal agenda implemented in Bolivia? There is a lot to unpack, and utilizing technopolitics – the idea that things have inherent politics – is the best way to understand what happened. Utilizing the ideas presented in Langdon Winner's *Do Artifacts Have Politics?* (1980), this scenario will be looked at using both a top-down approach and a bottom-up approach. Additionally, looking at Von Schnitzler's (2008) and Williams's (2018) analyses of neoliberal water policy through technopolitics, the

technopolitical frameworks in which heterogeneous relationships that contribute to the whole political-economic landscape interact will be applied to Cochabamba.

In Cochabamba, the federal government changed their laws to allow for private investment into their country in order to stimulate their economy, consolidate debt and work towards large-scale economic development. The intended consequence of this are simple to see, and in some ways they were successful. However, the government failed to understand what this type of neoliberalism required. The government essentially gave away too much power to the foreign company, which limited their position as a major stakeholder in the water decisions. The government also did not understand how to effectively cede power. Before the privatization, only 57% of the metropolitan population was connected to the municipal water system, which meant that significant investment was needed from AdT to achieve universal service (Spronk and Crespo, 2008).

The unintended cost incurred by AdT after assuming control in December, 1999 were astronomical. To mitigate this, they raised costs by “an average of 35%... necessitated by such government requirements as paying down more than \$30 million in debt accumulated” and for the “increase of water availability by 30%” (“Bechtel Perspective on the Aguas Del Tunari Water Concession in Cochabamba, Bolivia”, 2005). Part of the government’s goals were met; water access was increased. At the same time, it was unintended that the water became priced-out of what a large percentage could pay. However, this was intended by the company itself; they wanted to (and had to) make money. In fact, they contractually were obligated to realize a 15% return on investment in the first year.

The politics ingrained in the system are also seen in the relationships between the World Bank, AdT and the Bolivian Congress. When the January, 2000 water bills arrived showing enormous increases in prices, the World Bank instructed Bolivia not to subsidize the rate and bill increases (Norris and Metzidakis, 2010, p. 38). The official World Bank

statement on the matter was that, “[n]o public subsidies should be given to ameliorate the increase in water tariffs in Cochabamba” (Gonzalez and McCarthy, 1999). With regards to the third main stakeholder in the administrative position, the World Bank perpetuated the malcontent festering in Cochabamba by advising against government intervention. For the World Bank, the intended result became higher prices for the populous and marginalization, but they did not want the ensuing strike and violence in the city. In this case, the politics of the water system had three major stakeholders, the World Bank, AdT and the Bolivian Congress, that all helped to create the eventual political discourse.

Moving forward, the 2000 Bolivian Water War will be looked at using a bottom-up approach of technopolitics. First, the placement of water utilities will be examined. The placement has implicit politics. A majority of Cochabamba’s existing water infrastructure existed in the wealthiest areas of the city (Spronk and Crespo, 2008). This is a pattern seen time and time again. Infrastructure is developed in a way that benefits the central business district (CBD) and places where commerce occurs. These are parts of the city that have the most wealth, so naturally the wealthiest people live there and are able to have the best water (Bakker, Kooy, Shofiani, and Martijn, 2008). Now, keep in mind that infrastructure is expensive to develop, but the incentive of building in the CBD (whether this is Cochabamba or elsewhere) is intuitive. Despite this, the unintended consequence is that it marginalizes the poor. The incentive to invest capital for little return just is not there. This proves one thing: the inherent politics of water systems favor the wealthy at the expense of the poor.

Another important stakeholder in this case is the middle-to-lower-class consumer. In this case, this includes the 43% of residents that were not connected. The politics of the water infrastructure affected these people most. The fact that decision-makers ordered construction away from this population meant that they would need to spend the most per unit volume on water that was poor quality (Coleman, 2012). At the same time, the effect of Law 2029

changed how these people could use their groundwater. The politics of water system legislation effectively nullified the painstaking work of creating irrigation channels from the Andes and wells. This ultimately disenfranchised over 300,000 people in the metropolitan region.

The political influence ingrained in the Cochabamba water system is very evident. By looking at the relationships between the sources of power in Bolivia (whether that be Congress, AdT, or the World Bank) and the physical system and its impact, neoliberal agenda can be successfully critiqued. At the same time, this framework and its application to neoliberalism is not limited solely to Cochabamba; in reality it can be extended to fit the entire realm of water privatization.

Water Privatization: A Modern, Holistic Approach

After examining the 2000 failure of neoliberalism in Cochabamba, it is apparent that water privatization has its flaws, and that it is not the most effective way to manage the resource. Technopolitics will be used as a backbone in order to look at water services in a modern frame utilizing.

First, the global scale will be assessed since 2001 to see if water systems have since been used as an engine for inequity. It must be noted that neoliberal agendas that involve foreign investment to take power over a utility have continuously caused political-economic plight in Latin America, especially. In Tucumán, Argentina many of the same issues were faced during the neoliberal reform after the Argentine Financial Crisis.

Like Cochabamba, in order for Argentina to receive a loan from the World Bank, they needed to devolve their water system to a private company. However, the infrastructure already in place was aging and not expansive. Tucumán struggled to overcome this (Coleman, 2012). Additionally, the political decisions made by the Tucumán provincial

government effectively barred consumers from contributing input and influencing decisions. Not only were rates exorbitant, but the quality of water diminished as manganese began infiltrate the water supply (Coleman, 2012). The political administration, the World Bank, and the private company again created legislation that not only commoditized the water, but also made decisions that lessened the quality of life.

The Tucumán example is another exposition of how this style of neoliberalism does not provide services that are equitable universally. In this case, the government prevented one of the most important interest groups – the electorate – from sharing their inputs to the change in power. Without the peoples’ advocacy carrying any weight in the political spotlight, the water system could not become something that was accepted. Much like in Cochabamba, the neoliberal reform in Tucumán was not executed well; there was too much power given to the private holding company, and commoditization was the consequence.

Water for the Future – A Recommendation

Through these additional cases, it is very apparent through a technopolitical lens that a neoliberal political agenda surrounding water systems is not the most effective way to govern the water. However it doesn’t end here. There are new approaches to water management that have the potential to bring water equity as well as constant improvement.

After analyzing the failures and mishaps present in neoliberal water agendas, three main lessons are learned; the western perspectives of the World Bank prevented decision-makers from truly understanding what is needed in developing nations, the national governments consistently fail to consider the ramifications of devolving power, and that this style of neoliberalism perpetuates inequity in the access to water due to profit motives. It is safe to conclude that neoliberalism – that is devolving utility administration to a private,

foreign group – is not the best way to manage water. Private companies alone cannot take into consideration all of the complex values surrounding water (Romero Lankao, 2011).

While these specific types of neoliberal agendas have failed, there is solace. There can be better management of water that takes better consideration of what people need. Some degree of privatization some degree of involvement can bring forth stimulus for improvement (Romero Lankao, 2011). Additionally, there needs to be a better definition of what water companies do and what the scope of their jurisdiction is; this especially needs to be agreed upon universally in order to fully work. Many countries that underwent neoliberal reforms for water services overlooked the idea that water is needed by everyone, and private holding companies were able to exploit that (Romero Lankao, 2011).

Additionally, an issue that has been seen in Cochabamba, Tucumán and many other nations that devolved water systems was a non-compete agreement. Only one group was allowed to manage water, and it limited the market pressure. No competition was allowed to influence efficiency and lower rates to customers (Romero Lankao, 2011). In order to successfully privatize water services, competition is necessary in order to give a sense of financial risk and incentivize companies to invest intelligently.

Rincón (2016) introduces an assessment of a public-private partnership (PPP) in Puebla, Mexico. Unlike complete devolution where the private company has autonomy over company policy, the Puebla case has a private contractor managing the water system while the state can still regulate and ensure equitability. This is a much more effective approach, and it allows for a constantly modernizing system without the risk of commoditization. The recent success in Puebla serves as a proof of concept. A water system governed by both public *and* private groups has the potential to protect liberty and increase equity.

Through the use of technopolitics to analyze the water management systems in developing countries, it is conclusive that true neoliberalism with only market regulation fails

to consider the values and needs surrounding water. At the same time, the idea of privatization cannot be disregarded entirely. There are benefits of private capital, but there needs to be a degree of synergy between the government and the private companies. With a PPP initiative, there is promise. States that find the correct balance between the market regulation and the state legislation will keep water prices affordable, while also encouraging system improvement.

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