

A Political Economy Analysis of Electricity Tariff Restructuring in Nepal



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1. Introduction

Confronted by chronic power cuts of up to 18 hours a day, Deputy Prime Minister (DPM) Bharat Mohan Adhikari declared a state of energy emergency on March 23, 2011, and pledged to work towards eliminating the crisis. As part of this initiative, the Government of Nepal, after receiving approval from the Council of Ministers, presented the Energy Emergency Action Plan 2011, an effort aimed at fast-tracking the generation of 2500 MW of electricity by 2016. One of the key elements of the plan was to entice Nepali independent power producers (IPPs) to invest in the hydropower sector. But this required the Nepal Electricity Authority (NEA) to increase the power purchase agreement (PPA)—the rate for electricity sold by developers to NEA—which had remained fairly stagnant for over a decade.

While many viewed the PPA increase as an important indicator that the government was serious about creating incentives for hydropower development by the private sector in Nepal, there was also a rather unexpected decision to dissolve the Electricity Tariff Fixation Commission (ETFC). ETFC had been established a decade earlier with the authority to set the retail tariff rate—the rate NEA charges its customers for energy—and it had already denied multiple requests by NEA for an increase. This rate hike was important for NEA, because for every PPA it negotiated the retail tariff rate determined the amount of profit (or loss) that it would make, and it had been running in the red for over a decade. However, 15 months later, on June 29, 2012, a newly reconstituted ETFC gave the green light for the government to hike the retail tariff by an average of 20 percent.

Set against this backdrop, this paper employs a political economy framework to analyze the politics of tariff restructuring—both the PPA and the retail tariff. It identifies the interests of actors and institutions, and the strategies they used to navigate and affect an outcome. The first section establishes some background by exploring key issues pertaining to the tariff restructuring. It does so by mapping stakeholders' interests in the context of a rapidly developing hydropower sector in Nepal. The section that follows explains the involvement of The Asia Foundation (the Foundation) and its implementing partner, the Niti Foundation (Niti). The third section examines the turn of events that resulted in the decision to allow a hike in PPA rates, then outlines the activism that culminated in a hike in the consumer tariff. In conclusion, the paper critically reflects on Niti's engagement in the tariff restructuring process, and discusses the implications for future engagement in the policy arena.

2. Hydropower Sector in Nepal: A Brief Institutional Context

The Ministry of Energy (MoE) and its Department of Electricity Development (DoED) have jurisdiction over the energy sector in Nepal. DoED functions as the chief coordination unit for promotion and development of the hydropower sector. It performs regulatory duties and is primarily responsible for awarding licenses to hydropower projects. It is also responsible for developing policies and programs for the development of the hydropower sector. NEA, an autonomous public utility authority, was the primary institution charged with generating, transmitting, and distributing adequate, reliable, and inexpensive electricity. The government-owned, for-profit company was in charge of planning, constructing, operating, and maintaining generation, transmission, and distribution facilities in Nepal's power system. The monopoly ended, however, due to two events: first, the Hydropower Development Policy enacted in 1992 established a liberalized market framework for hydropower development, which allowed private sector developers to enter and participate in electricity generation; and second, the Community Electricity Distribution By-Law of 2003 facilitated the entry of third parties into retail electricity distribution, particularly in the form of communal utility enterprises such as rural electricity cooperatives and other community associations.

Owing to its natural topography, Nepal has the potential to generate significant hydropower. However, in the time since the first power plant was built over a hundred years ago, only a fraction of this potential has been tapped. Over the years, numerous consultations and plans have been drafted and assessed by donors and government administrations alike, yet hydropower remains under-generated. As a result, supply of electricity has exponentially lagged demand in recent years. For example, according to the NEA, peak demand for electricity almost doubled between 2004 and 2012—from 515.24 MW to 1,026.65 MW—resulting in a supply deficit during the dry season of almost 500 MW. This increase in demand has remained unmet, primarily because of the failure to develop new sources of energy production and the inability of existing power plants to produce and distribute efficiently. This gap between demand and supply has compelled the NEA to resort to scheduled power cuts, commonly referred to as load shedding, throughout the year. The highest load shedding recorded in 1990 was 12 hours per day, which has increased to as high as 20 hours per day at present. Given that peak demand for electricity is projected to reach 2,052 MW by 2020 (NEA, 2012), and in the face of stagnant power sector growth and increasing political volatility, power sector reform is urgently needed.

3. Past Reform Initiatives

Since the late 1980s, concerns over an impending power crisis in Nepal have persisted. The end of the Panchayat regime in 1990 provided the impetus for addressing the power crisis, and a discourse of hydropower-centered economic growth gained strong traction in national debates. Sector reform initiatives since then have centered on increased generation, increased cross-border trade, and, to a certain extent, promotion of alternative energy.

a. Increased Generation

Until the early 1990s, the state exercised a complete monopoly over the hydropower sector. However, it was unable to ease the growing power crisis in the country, due to a limited capacity to source larger investments required for additional power generation. The urgent need for investment in the sector prompted the state to adopt a more liberalized policy framework through the Hydropower Development Policy 1992. For the first time in Nepal's history, a liberalization thrust paved the way for the entry of the private sector—national and international actors—into hydropower generation. By 2011/12, 25.69 percent of energy supplied from the national grid was being sourced from power generated by independent producers (NEA, 2012). However, despite encouraging signs of private investment in the sector, actual engagement of the private sector in project development and power generation has been limited by Nepal's unstable political climate, weak power sector governance, and inadequate complementary policy reform in trade and power transmission.

b. Increased Cross-Border Trade

The NEA's inability to supply sufficient power to meet growing domestic demand created compelling conditions for cross-border power trade with India. Today, roughly 17.85 percent (around 120 MW) of total energy supplied by the national grid is imported from India (NEA, 2012). Further, the Government of Nepal has entered a power sales agreement with the Power Trading Company of India to import an additional 150 MW in the long run. Although the decision to import power from India is deemed important, its sustainability is uncertain, primarily because (1) Nepal lacks the necessary transmission infrastructure to fully engage in power trade; (2) there are negative public sentiments on Indo-Nepal relations in Nepal, especially when it comes to hydropower, with popular discourse arguing that instead of importing, Nepal is fully capable of exporting power to India; and (3) a rapidly growing economy such as India will ultimately focus on securing its own energy sovereignty.

c. Promotion of Alternative Energy

Owing to the challenges faced by the government in increasing power generation and expanding the existing national grid, policies such as the Renewable Energy Policy 2006 and the Subsidy Policy for Renewable (Rural) Energy 2009 were introduced to promote renewable and alternative energy. These key policy instruments emphasize providing necessary subsidies for promoting biomass, micro-hydropower, solar photovoltaic, and wind energy systems across Nepal. However, despite tremendous potential for alternative energy in Nepal and its importance for access to energy in rural areas, its rate of growth and adoption has been slower than anticipated. Financing for alternative energy and the future sustainability of off-grid isolated systems, are key considerations for alternative energy promotion and development in Nepal.

4. The Asia Foundation's Engagement in Nepal's Hydropower Sector

In 2010, the Foundation commissioned Niti to conduct a study to identify the critical constraints on rapid development of hydropower in Nepal. The final report, *Catalyzing Rapid Hydropower Development in Nepal: Understanding Underlying Constraints and Engaging Reform Constituencies*, identified the following constraints: (1) failure to enact a hydropower development statute, (2) failure to adjust electricity tariff rates, (3) inability to engage with local communities, (4) lack of infrastructure for the transmission of electricity, (5) failure to break NEA's monopoly, and (6) the inability to mobilize foreign direct investments towards hydropower sector development (Niti Foundation, 2011). Despite broad political consensus on the importance of promoting hydropower in Nepal, it became clear that several of the constraints that have impeded its growth were more political than technical in nature. In 2011, the Foundation and Niti urged several policy reform measures to promote rapid hydropower development in Nepal, including reform of the Electricity Bill 2008, the unbundling of the NEA, and tariff restructuring.

This study highlights the Foundation's efforts, conducted with Niti, to address the failure to restructure electricity tariff rates. Tariff restructuring primarily addresses two interdependent issues: the Power Purchase Agreement (PPA) rate—the price NEA pays developers for electricity—and the Retail Power Tariff rate—the price consumers pay NEA for electricity. Both these rates remained stagnant for over a decade. Proponents of a tariff increase claim that inflation and other mounting costs associated with hydropower plant construction and development have resulted in an unfavorable investment environment, creating a major bottleneck in the development of the hydropower sector in Nepal.

Failure to enact a hydropower development statute, along with subsequent dissolution of the Constituent Assembly, came as a major setback to the growth of the hydropower sector. As an alternate policy initiative, proponents associated with the sector pressed the need to review and adjust electricity tariff rates as an immediate measure to increase power generation capacity and stabilize the existing energy market. Although Niti's advocacy to enact a hydropower development statute did not succeed at the time, it chose to redouble its advocacy efforts on electricity tariff restructuring; it seemed to be the right moment to push for reform. Niti worked with primary stakeholders in the tariff restructuring issue through a series of consultative meetings. The meetings provided Niti with the opportunity to better understand the issues at hand. Rigorous consultations with both proponents and opponents of tariff restructuring clearly showed that there was a pressing need to raise both PPA and consumer tariffs in order to attract Nepali producers to invest in hydropower sector development. Following this assessment, Niti sought consensus among all the major players that tariffs not only needed to be raised, but that this needed to happen immediately. Mobilizing key power sector stakeholders such as consumer groups, government entities, hydropower developers, and political

parties, Niti then convened a series of public forums to cement everyone's commitment to tariff restructuring and to exert pressure on the government to take action.

5. Working Politically: From “Thinking Politically” to “Acting Politically”

Policy reform is a challenge in a vacuum. Newer frameworks like political economy analysis have been introduced to challenge the technocratic and formulaic ways in which development theory and practice have traditionally been managed. Such an approach provides insights into the underlying interests and incentives of stakeholders and the ensuing political settlements among them (Dixit, 2004; Drazen, 2000; Stone, 2002; Tolentino, 2010), which can be addressed by working politically on targeted reforms that pursue a more equitable distribution of resources and power (The Asia Foundation, 2010; North, Wallis, & Weingast, 2009).

However, literature on “working politically” still reflects the challenges of transitioning from analysis to action, i.e., from “thinking politically” to “acting politically” (Sturzenegger et al., 1998; World Bank, 2010). “Thinking politically” is to shift the view from trying to identify purely technical aspects of policy making or restructuring to analyzing the politics of policy making; “political” in this context may be understood as both the political context within which such policymaking takes place, and the different forms of institutional and political capital that actors and stakeholders within the policy regime bring with them as they attend meetings, workshops, and so on. The transition from “thinking politically” to “acting politically” requires identifying such actors and mobilizing them for change. For example, “reform operators” with relevant skills and networks to effectively work towards a reform objective are the key players in championing the reform effort (The Asia Foundation, 2010). Likewise, there is a shift in focus from international aid agencies as the principal drivers of the process to local partners, who have the local expertise and legitimacy to work in the domestic political arena. It is in this spirit that various development actors, including the Foundation, are increasingly focusing on introducing methodology that creates new knowledge in the field of policymaking. As such, the Foundation has attempted to use political economy as an analytical framework, focusing primarily on the need for reform strategies to critically document relationships and information flows among relevant stakeholders.

Development entrepreneurship, a key focus of the political economy framework, encourages the employment of an iterative, learning-by-doing process as it cycles through three stages—technical and political economy analysis, development of strategies, and technical and political action—in order to discover which reforms work and which do not. Placing local leaders in the forefront of the reform process effectively promotes country ownership and also allows development agencies to skirt the sensitive issue of infringing on national sovereignty. Therefore, in building “winning coalitions,” or aligning the interests of those seeking reform, development actors must work within the reality of the power struggle inherent in implementing and institutionalizing change. “Working politically” allows development actors to navigate the various political agendas of relevant stakeholders and capitalize on incentives and motivations in driving change.

Based on this brief literature review, elements of “working politically” include, but are not limited to:

- Strategically engaging key stakeholders by building and maintaining relationships.
- Creating reform networks or broad coalitions that work towards the same reform effort.
- Placing less emphasis on providing technical solutions and more on increasing the political viability of the reform.

It is within this theoretical framework that the Foundation and its partner Niti pursued power sector reform in Nepal.

6. Scope and Methodology

This research has the following goals:

- To conduct a political economy analysis of tariff restructuring efforts in order to identify the political processes that resulted in the policy reform.
- To assess Niti's role and its strategy of working politically towards aligning interests to build and sustain momentum for tariff reform.
- To explore whether this paradigm of working politically for policy reform can be replicated to address other policy issues.

The research is primarily based on inputs from key informants who were individually and institutionally active in the reform process. Niti conducted in-depth interviews with stakeholders from the hydropower sector of Nepal, including ex-ministers, representatives of large political parties, current and former bureaucrats, representatives of the hydropower developer and consumer organizations, hydropower experts, and policy entrepreneurs. The chronology of events leading to the actual reform in electricity tariff rates is based on the information collected through these informants as well as secondary data sources from national dailies and online resources.

7. A Closer Look at Tariff Restructuring

Over the last decade, numerous studies have highlighted the deteriorating financial condition of the NEA. In 1998, the NEA recorded a profit of NRs. 154 million from its operations, compared to the deficit today. Many studies indicate that the discrepancy between what the NEA pays to the producers of electricity and what it charges consumers is one of the key reasons for the NEA's current financial condition. It is in this context that in 1998, the Asian Development Bank (ADB) identified the need to increase the consumer tariff from the prevailing NRs. 4.98 to NRs. 7.33 per kWh. The proposed increase was to take place in two installments—28 percent in November 1998, and a further 20 percent in 2001. However, by late September 2001, the Nepali government had enacted only a 22 percent increase. Despite the government's decision to introduce a semi-automatic tariff adjustment mechanism in May 2001 to keep pace with growing inflation, further revisions of consumer tariff rates remained stalled for over a decade (ADB, 2009).

Following the tariff adjustment in 2001, the average revenue rate of the NEA remained constant at NRs. 6.71 per kWh, against a cost including transmission and distribution charges of NRs. 9.05 per kWh. By 2009, under-pricing of electricity was costing the NEA NRs. 1.91 per kWh (NEA, 2009). This price-cost gap exacerbated the already dwindling financial health of the NEA, resulting in losses of NRs. 4.7 million in 2009 alone (NEA, 2009). Before 2012, when the consumer tariff was finally hiked, the NEA was facing a loss of NRs. 2.39 on every unit of electricity. By 2012, the state-owned power utility corporation had already incurred a cumulative loss of NRs. 28 billion (Singh, 2012). The downward trend in the NEA's financial turnover weakened its capacity to invest in new projects that could address the nation's worsening power deficit. Additionally, despite a potentially large demand from the private sector for new hydropower investment in Nepal, the low PPA rate for domestic producers was frequently cited as an obstacle to attracting new investors in hydropower development.

In 1994, the government formed the ETFC to review and approve tariff filings made by the NEA and other licensed authorities under the Electricity Act of 1992. ETFC was an inclusive body that had representation from the bureaucracy, the electric utility sector, industry, consumers, and economists. Between 2001 and 2005, in response to its growing losses, NEA submitted the following proposals to the ETFC to raise the consumer tariff (ADB, 2009), all of which failed to materialize:

- 2001: Semiannual Automatic Adjustment Procedures limited to 5 percent per annum
- 2003: Seasonal Tariff Proposal, no increase in tariff but 5 percent additional revenue from additional sales
- 2004: Tariff Proposal following existing structure

- 2005: Seasonal tariff proposal resubmitted
- 2005: Tariff proposal following existing tariff structure with an increase of 8–10 percent
- 2005: Tariff proposal following existing tariff structure with an increase of 10–15 percent

8. Mapping Stakeholder Interests in Restructuring Electricity Tariff

As mentioned earlier, tariff restructuring addresses two interdependent issues: the PPA rate, which the NEA pays its producers, and the consumer tariff rate, which the NEA charges its customers. As stated in the energy emergency legislation, the intent of the government is to increase private investment in the hydropower sector. Although the government's decision to increase the PPA was therefore tied to encouraging private sector investment, many stakeholders opposed the decision. Differences among key stakeholders on the mechanism to restructure the two rates fomented conflict over tariff restructuring. The following sections will map the competing stakeholder interests in electricity tariff restructuring.

a. Nepali Independent Power Producers

The strongest advocates for increasing the PPA rate are the Nepali private sector developers, represented by the Independent Power Producers Association of Nepal. Since the liberalization of hydropower production in the 1990s, the contribution of Nepali IPPs to the overall supply of electricity has grown to a third of the country's total power supply. However, Nepali producers feel short-changed by the PPA process for two particular reasons. (1) The PPA for foreign investors, particularly in the Khimti I and Bhotekoshi projects, was denominated in dollars rather than Nepali Rupees. During negotiations, the exchange rate for dollars to rupees was below 1:60; today the exchange rate is above 1:85. This essentially means that the NEA is paying a higher rate to foreign investors. (2) Nepal's desperate attempt to find alternate measures to overcome the growing power deficit increased its reliance on India. The urgency of NEA's need for imported electricity weakens its bargaining position with Indian power producers. Average PPA rates between the NEA and Indian IPPs is NRs. 10.72 per KWh, compared to NRs. 4.44 per KWh for Nepali IPPs. Citing these differences in PPA rates, domestic IPPs have repeatedly called on the government to duly acknowledge the role and contribution of domestic IPPs in the Nepali hydropower sector, and have exerted pressure on the NEA to review and readjust the PPA rates.

b. Consumers

Because Nepal's electricity rates already rank among the highest in South Asia (Pyakuryal, 2004), increasing rates would be unpopular among consumers, particularly given the government's institutional failure to realize the country's enormous hydropower potential. Consumers of electricity in Nepal can generally be placed into two categories on the basis of their stance on tariff restructuring: industrial and non-industrial consumers.

Industrial consumers, while constituting just 1.61 percent of all electricity consumers in Nepal, account for 35.52 percent of electricity revenues collected by the NEA (NEA, 2011). Given the impact of unreliable electric power on levels of production, industrial consumers have expressed their willingness to pay a higher price for reliable electricity. Currently, Nepali industries must rely on alternate sources such as inverters and generators, which require substantial investment and impose significant operating costs.

Domestic consumers make up 94.94 percent of consumers of electricity from the national grid, accounting for 42.78 percent of total electricity revenues collected by the NEA (NEA, 2012). Various consumer groups, electricity cooperatives, and user groups represent domestic consumers, under the umbrella of the National Association of Community Electricity Users Nepal (NACEUN). These

groups have repeatedly expressed their concerns about raising the consumer tariff in Nepal.¹ NACEUN's institutional agenda has been of special significance in tariff restructuring. Since the inception of community-based electricity distribution in 2003, the NEA has consistently attributed its deteriorating finances to the subsidized electricity it provides to electricity cooperatives. It argues that, with electricity supplies limited, providing subsidized electricity to lower paying customers prevents it from servicing its high paying customers. NACEUN, on the other hand, has been calling for new legislation on community-based electricity distribution leading to a new institutional set-up to manage and govern community electrification.

c. Electricity Tariff Fixation Commission

The ETFC's unwillingness to adjust consumer tariffs was one of the greatest obstacles to tariff restructuring. Despite several NEA proposals to revisit the consumer tariff, the ETFC's response was inconsistent. This, in turn, made the NEA reluctant to adjust the PPA for developers. While agreeing in principle to raise the consumer tariff, the ETFC highlighted the NEA's lack of efficient operational performance as its primary concern. Instead of promoting the proposed consumer tariff increase as a way to address the NEA's inefficiency and/or the sluggish growth of the hydropower sector in Nepal, the ETFC laid emphasis on the NEA's improvement in operational performance. The ETFC felt that raising the consumer tariff to help solve the NEA's budgetary deficiencies was not an effective and sustainable hydropower reform strategy, and argued that the NEA's continued losses were due, not just to low consumer tariff rates, but was also largely associated with the degree of political interference and administrative and financial irregularities within the NEA. Consumer groups were concerned that, despite any increase in the consumer tariff, load shedding would persist, and so would the NEA's internal governance and management inefficiencies. Finally, the ETFC accused the government of colluding with domestic IPPs, and charged that increasing the consumer tariff was just a pretext to hike PPA rates.

d. Nepal Electricity Authority

It is well established that the gap between the PPA and the consumer tariff has been a major factor in the NEA's financial condition. The NEA is under constant pressure to increase the PPA to promote investment in the hydropower sector, but despite several proposals for review from the NEA, the unwillingness of the ETFC to raise the consumer tariff thwarts the NEA's ability to do so without incurring further losses, which only exacerbates the NEA's weakening financial condition. The NEA has stated that it understands the need to increase the PPA in order to attract private investment, but it is quite clear that it is in no position to do so unless the ETFC is willing to increase the consumer tariff.

e. Political Actors

Despite acknowledging that there are issues surrounding the hydropower sector, political actors have shown a serious lack of desire and commitment to address the issues creatively and constructively. The hesitancy these actors have shown towards a tariff increase stems from the fear of losing popular legitimacy and consent from the citizens. It is worth noting that 94.94 percent of domestic energy customers are served by the national grid (NEA, 2012). The majority of users are the constituents of the various political parties. A similar political fear led the government to rescind a consumer tariff

¹Average domestic consumption in the cooperatives is 21 kWh/month. Approximately 5 percent of consumers use less than 10 kWh/month; 85 percent use 15–25 kWh/month; and 10 percent use over 25 kWh/month (Yadoo and Cruickshank, 2010). Rural electricity consumer groups pay NRs. 4.00 per kWh for up to 20 units, with the minimum monthly charge for a 5 ampere line set at NRs. 80.00, but a majority of users consume less than the minimum paid for. Consumer groups have repeatedly asked the government to acknowledge the discrepancy in consumer tariff rates, and have called on the government to review tariff structure based on actual demand and consumption in the rural households.

increase in 2002–2003, after citizens led street demonstrations against the tariff hike. Moreover, governments in different political times have introduced populist policy measures to further subsidize the consumer tariff. For example, in 2002, under the royal regime, the government set the electricity tariff for wholesale community distribution at a fixed cost of NRs. 3.50 per KWh—at a time when small industry paid NRs. 6.60 per KWh—as a strategy to gain popular support for the regime (Nepal and Jamasab, 2011). Furthermore, as the media continues to expose financial malfeasance within NEA, public faith in the ability of politicians and bureaucrats to competently address questions around hydropower generation continues to erode.

f. Others

Among other key stakeholders, bureaucrats and labor unions are also embedded in the politics of tariff restructuring. For example, while the issues surrounding electricity tariff adjustment are outside the DoED’s immediate scope, their covert interest favors increasing PPA rates. Since the department controls all hydropower licenses, an increase in the PPA rate represents an opportunity for the department to raise licenses fees, based on higher rates of return for private investors. Likewise, politically affiliated labor unions remain opposed to tariff restructuring in the face of the ETFC’s call for internal governance and management reform in the NEA as a condition of any hike in the consumer tariff. They see ETFC’s call as a potential threat to the NEA’s 10,000 existing employees, who enjoy many benefits including 100 units per month of free electricity.

Table 1: Stakeholders and Their Interests in Tariff Restructuring

Stakeholders	Interests
Independent Power Producers	Strongest advocates of PPA increase. They wish to review PPA rates to address the discrepancy between foreign and domestic IPPs, and increase the PPA rate so that developers make an adequate return on their investment.
Consumers/NACEUN	Concerned about any increase in the consumer tariff. They advocate a new governance regime for community electrification and argue that social equity must be factored in when considering consumer tariff hikes.
ETFC	Concerned about any increase in the consumer tariff. They advocate a new governance regime for community electrification.
NEA	PPA must increase to attract private investment in the hydropower sector. Should PPA rates rise, they argue, so must consumer tariffs, in order to ensure the agency’s financial viability. This willingness to increase tariffs faces opposition from the ETFC.
Political parties/actors	Hesitant to increase consumer tariffs because of the fear of popular backlash.
Others (bureaucrats and labor unions)	Bureaucrats: support increasing the PPA to increase license fees paid by developers. Labor unions: Oppose PPA increase.

9. Drivers of Reform

The outcomes of policy decisions are often strongly identified with institutional linkages, but in reality they are guided by the role, capacity, and strategic choices of key individuals and experts within the reform setting (Haggard, 1995; Fischer, 2009). Institutional decisions that are, or are not, enacted on tariff restructuring can be attributed to the interests and motivations of individual actors within the institutions. This section introduces the individuals who have influenced, in various ways

and capacities, the decision to restructure tariffs. It presents a vivid case of polarizing, colluding, and overlapping vested interests.

Historically, the Communist Party of Nepal-Unified Marxist Leninist (UML) has shown particular interest in the hydropower sector. Since the liberalization of the hydropower sector and the success of the Puluwa Khola Hydropower Project in 2000, UML-affiliated investors and developers have been in the lead and have had a distinct advantage in the hydropower sector. Many inside the UML, particularly the leadership, invested in the sector by holding licenses for power generation. The UML's Natural Resource Department (UML-NRD) has been championing reform agendas in the hydropower sector, most of which translate into the party's vision for hydropower development in Nepal. Pradeep Nepal, Ananda Pokhrel, Pashupati Chaulagain, and Sher B. Tamang, among others, were some of the UML-NRD's prominent champions of tariff restructuring. The four leaders were also involved in the initiation of the Upper Tamakoshi Hydro Project, a 456 MW hydro project in Dolakha. In 2009, building on their decade-long experience in hydropower development, which included difficulties experienced in initiating the Upper Tamakoshi project, the UML-NRD presented a reform proposal to Prime Minister Madhav Kumar Nepal. Despite numerous attempts and the Prime Minister's full support, however, the proposed reforms did not materialize, mainly due to strong resistance from the ETFC, newly reinstated for the purpose of raising the electricity tariff. The ETFC was reinstated after the UML-NRD identified low PPA rates as a major obstacle to investment in hydropower generation and concluded that PPA rates couldn't be raised without raising the consumer tariff.

Resistance from the ETFC is of interest at this point because it highlights the primary disagreement between the proponents and the opponents of a PPA increase. The ETFC was reinstated under the chairmanship of Mahendra Nath Aryal, former secretary of the Ministry of Water Resources, but it was Jyoti Baniya who was able to champion the cause of electricity consumer groups, including a 16-point reform agenda forwarded to the NEA as a pre-condition for tariff reform. Mr. Baniya, an advocate and stalwart consumer rights activist, was included in the ETFC instead of Dilli Ghimire, chairperson of the NACEUN, who was initially offered the position. Upon learning that the ETFC had been reconstituted to raise the tariff, Mr. Ghimire decided not to be part of a decision that would be unfair to the rural populace and go against the demands of the electricity cooperatives that framed the existing tariff. Instead, NACEUN chose to send Mr. Baniya to represent consumers on the ETFC.

It is also interesting to note that some members of the UML-NRD had reservations about Mr. Aryal, believing that as ETFC chairperson he exerted influence against the reform initiative led by the UML. Aryal, a senior ex-bureaucrat who had served at the Ministry of Water Resources, was nominated by the coalition government of UML and Nepali Congress. With the change of government in 2009, Jhalanath Khanal became the new Prime Minister (PM), and Bharat Mohan Adhikari, a senior UML party member, became Deputy Prime Minister (DPM) overseeing the finance and energy portfolios. This new arrangement in government provided an opportunity for the UML-NRD to reintroduce their hydropower reform agenda.

As the nation continued to reel from chronic power cuts, growing public expectations of government relief added significant pressure for policy reform. Prompted by the UML-NRD-proposed reform, DPM Adhikari initiated a series of consultative meetings with government and private sector representatives and party-aligned experts and individuals to seek solutions to the power crisis. The reigning consensus at these consultations primarily attributed the existing energy crisis to lower power production rather than leakage or administrative inefficiencies as argued by the ETFC. The resulting policy declared a period of "energy emergency" to fast track the generation of 2500 MW of electricity in four years. Accordingly, DPM Adhikari appointed a team led by Chief Secretary

Madhav Ghimire and Secretaries Rameshwor Khanal and Shital Babu Regmi of the Ministry of Finance to draft the Energy Emergency Bill.

Responsibility for background work on the draft bill was given to a team of handpicked appointees: Dr. Govinda Nepal, Sujit Acharya, Sher Bahadur Tamang, and Krishna Hari Banskota, Secretary of the Ministry of Finance. Dr. Govinda Nepal had previous experience assessing hydropower policies, including those envisioned by PM Pushpa Kumar Dahal and PM Madhav Kumar Nepal. Dr. Nepal laid emphasis on creating efficient self-regulatory market mechanisms, including market-driven electricity prices, while strongly opposing subsidies to rural electricity cooperatives. Sujit Acharya, a former NEA board member and relative of Deputy PM Adhikari (Nepali Times, 2012), was consulted, and later joined the committee. As the CEO of IDS Energy Pvt. Ltd. and Convener of the Energy Development Council of the Confederation of Nepalese Industries (CNI), Acharya represented the interests of the domestic IPPs in the drafting committee.

10. Niti's Engagement

In December 2010, Niti hosted a series of consultations with representatives of key interest groups—conducted separately with consumers, domestic developers, and government regulators—to discuss their interests, challenges, and recommendations for the rapid development of hydropower in Nepal. This provided an opportunity for each group to convene and identify their collective priorities, and for Niti to understand the political terrain of hydropower reform in Nepal. It was collectively agreed that the failure to adjust the tariff for over a decade was a binding constraint. Domestic developers urged an increase in the PPA, the ETFC refused to increase the consumer tariff unless their 16-point demands were met, and the NEA was only willing to increase the domestic PPA following an increase in the consumer tariff. Although there were apparent differences, there was a clear consensus that the hydropower sector in Nepal was in urgent need of reform. Institutional priorities collided, but Niti believed that they could coalesce towards a common goal.

On February 7, 2011, Niti hosted a policy roundtable for concerned power sector institutions and actors, including the ETFC, the private sector, and political parties. The roundtable initiated an open dialogue between the key stakeholders about strategies for addressing the binding constraints. Throughout the discussion, each group acknowledged that a hike in electricity tariff rates was inevitable, but none was willing to support tariff restructuring until their own concerns were adequately addressed. For example, the ETFC reiterated their official position that consumer rates would be raised only if the NEA agreed to the institutional changes in their 16-point reform agenda aimed at improving operational efficiency. Despite ideological differences, the major political parties—UCPN Maoist, RPP, NCRPP, UML, and Nepali Congress—showed a commitment to recognize and address the impediments confronting the hydropower industry. By the end of the day, the roundtable arrived at a collective sense of purpose: the urgent need for tariff restructuring to catalyze rapid hydropower development in Nepal. Thereafter, between February and March 2011, Niti arranged individual meetings with numerous individuals associated with tariff restructuring, including members of the ETFC, political leaders responsible for water and energy policies in their respective parties, established private sector hydropower producers, and consumer representatives. The more informal style of these meetings helped maintain momentum on the issue while emphasizing that a common program for tariff reform was the top priority for the industry.

The present political time is laced with uncertainty, which makes political parties and affiliated groups prone to making and breaking alliances. Throughout these deliberations and consultations with different stakeholders, Niti harbored the concern that the political groups could break the consensus for reform and instead organize protests against a tariff hike. (The concern was valid, as a similar situation had previously created obstacles to implementing a petroleum price hike. Fearing public

unrest, political parties in the government refrained from increasing the price even though a price hike had been agreed upon. But a severe petroleum shortage helped generate political acceptability for immediate intervention to raise prices to conform to the international market.) To manage the potential political risk, Niti held meetings with representatives from various business and community groups to reassure political leaders that they would not face a backlash from their constituencies. As a result, the political parties agreed to support to the government in raising the consumer tariff.

On March 20, 2011, Niti collaborated with the Nepal Hydropower Association (NHA) to organize a major policy forum to consolidate progress made in smaller meetings and in the December 2010 and February 2011 workshops. Niti's strategic alliance with the NHA to convene the forum followed a legitimate call for power sector stakeholders to participate in initiating the reform agenda. Invited attendees included the ETFC, the NEA, investors and developers, consumer representatives, government officials, political party leaders, industry experts, and the media. The day ended with participants publicly declaring that higher-level discussion would take place and that the government would report forum proceedings presently.

The initiative of the new government to pursue hydropower reform undeniably created an environment conducive to Niti's efforts. Although Niti did not realize it at the time, DPM Adhikari had formed a working group of four individuals to draft the "energy emergency bill." In a little over a week, the group prepared a draft of the bill within a highly centralized work environment. Opportunely, participants at Niti's roundtable and policy forum came to be strategically placed in drafting the energy emergency bill. Ananda Pokharel of UML-NRD, who was instrumental in initiating a dialogue on tariff restructuring and power sector reform, and Sujit Acharya, who advocated for the role of the private sector and the need for a conducive investment climate in the hydropower sector, were influential in drafting the bill.

On March 23, 2011, three days after Niti's roundtable on tariff restructuring, the government made the Energy Emergency Plan 2011 public. The bill aimed at fast-tracking the creation of 2500 MW of electrical generating capacity by 2016 through various initiatives, including declaring the next four and a half years a period of energy emergency, and creating an independent, three-member energy commission to supersede the existing authorities of the various public power sector institutions, including the Ministry of Energy, the Department of Electricity, and the NEA. The adoption of the action plan also ended the long impasse over electricity tariff rates. The government effectively dissolved the ETFC and unilaterally increased the PPA rates by 20 percent.

The hike in PPA rates came much to the satisfaction of the private sector. The government's decisiveness gave it credence, and investors and other stakeholders felt a renewed sense of hope. The NEA, which had argued vigorously against an increase in PPA unless the consumer tariff followed suit, was assuaged by the government's commitment to subsidize any losses.

a. Niti and the Consumer Tariff

Admittedly, the move to dissolve the ETFC was unexpected. Niti was apprehensive that the dissolution would further delay an increase in the consumer tariff rates. Niti believed that it was absolutely necessary to increase the consumer rates in order to ensure the financial stability of the NEA, and that the government's decision to subsidize the NEA's losses was an act of shirking their political responsibilities by those in power.

In September 2011, four months after the decision to hike the PPA rates, and a month after the formation of a government led by the UCPN(M), the Unified Communist Party of Nepal (Maoist), a new tariff commission was formed. Given their history of political daring, pushing for initially controversial but eventually popular decision, such as the ongoing road expansion project in

Kathmandu, it was no surprise that, amidst continuing controversy over an increase in the consumer tariff, the UCPN(M) reconstituted the ETFC. Niti immediately redoubled its efforts to underscore the importance of increasing the consumer tariff. This time around, Niti strategically focused on the new ETFC members, one of whom was Uttar Kumar Shrestha, a former participant in Niti's workshops who had represented the NEA during the initial workshops in December 2010. As a former managing director of the NEA, Shrestha was a staunch proponent of increasing the consumer tariff, and an ally in Niti's reform effort to adjust the consumer tariff rate. In the meantime, the government was preparing to increase the consumer tariff rate unilaterally by approximately 25 percent. But in January 2012, the Supreme Court, acting on a *quo warranto* filed by the Forum for Protection of Consumer Rights, led by ex-ETFC member Jyoti Baniya, issued a preemptive interim order prohibiting an immediate hike in the consumer tariff rate. Baniya argued that under the third amendment of the Electricity Tariff Fixation Rules 1994, the ETFC could only raise the tariff five percent in a year. However, in April 2012, the Court revoked the order and called for a wider consultation to review the consumer tariff in order to make it "scientific" and "just" to all consumers.

On May 13, 2012, Niti collaborated with the NHA to convene a seminar to reinvigorate past commitments and ensure that restructuring of consumer tariffs still remained a government priority for hydropower reform in Nepal. As per the Supreme Court's call, the seminar brought together diverse stakeholders to discuss and reaffirm a common ground for reform. While the new ETFC still harbored reservations about the NEA's ability to achieve internal reform, its members were more amenable to restructuring the consumer tariff than their predecessors. Member of the newly constituted ETFC member Uttam Kumar Shrestha led the subcommittee tasked with this issue. As a former managing director of the NEA, Shrestha was aware of the critical need to increase the consumer tariff. During the seminar, Ghimire, representing the community user groups, also publicly advocated raising the consumer tariff, with a caveat that any increase should not affect the smallest consumers.

Niti and the NHA maintained contact with the ETFC even after the workshop. Together they submitted a petition to the ETFC requesting a revision of the consumer tariff rate. A meeting with Mr. Shrestha and Mr. Rameshwar Yadav, NEA's managing director, decided that although improving the NEA's operations was a priority, it would no longer be a precondition for a tariff hike. Shrestha assured the group that a tariff increase would not be used as a mere revenue-boosting tool for the NEA, and that the ETFC would review tariff rates based on the NEA's ability to improve operational conditions in the upcoming fiscal year. Niti and the NHA, in response, committed to further mobilizing constituencies intent on reform within the NEA. On June 28, 2012, the government finally announced a 20 percent increase in the consumer tariff. Keeping in mind the equity concerns of consumer groups, the increase did not affect consumers who use less than 20 units of electricity per month.

11. Conclusion: Reflections and Implications for Future Engagement

This section briefly reflects on the previous discussion and suggests some implications for Niti's potential future engagement in the policy arena. But first, a short take on the broader political context within which the politics of policy restructuring and reform take place.

Nepal is in a political transition in which its governing institutions lack coherent policies to reform and restructure institutions for more responsive and accountable governance. On the other hand, the country is also undergoing rapid political transition through which state restructuring is inevitable. In other words, while the old is dying out the new is yet being born. The Foundation's engagement in the tariff restructuring process took place within this broader political context. As a relatively neutral player in the contentious politics of hydropower development in Nepal, Niti was able to bring together

key stakeholders to share perspectives and work towards building a consensus for policy restructuring. On this note, a reflection on the policy restructuring process and its implications for potential future engagement in the policy arena is in order.

A few important lessons can be drawn from Niti's successful involvement with tariff restructuring. These lessons shed critical light on how to understand and manage the complexities of policy reform or restructuring, particularly in the face of political uncertainty at all levels—local, municipal/subnational, and national. Complexity presents opportunities as well as challenges for successful restructuring and reform.

a. Opportune Timing

When The Asia Foundation took a serious first look at hydropower development in Nepal, there were a few key conditions attracting institutional interest in hydropower reform and adding urgency to reform initiatives. Persistent load shedding had become a crisis that the government was under pressure to resolve. Institutional changes including a change in government and the reconstitution of the ETFC provided energy and impetus for reform. The competing interests of different hydropower stakeholders raised challenges, but also presented opportunities to collaborate and build coalitions. For example, the NEA's determination to increase the consumer tariff faced strong opposition from the ETFC and the NACUEN, fueling political parties' fears that an increase would produce a popular backlash. The mismatch and conflict of different interests created a challenge that needed to be overcome. But these conditions also created an opportunity for Niti to engage by initiating a dialogue on the possibility of policy reform/restructuring.

b. Identifying Policy Entrepreneurs

Such an opportune moment does not just appear, but must be found within the broad context of political and institutional change, embedded in the messy interactions of institutions and individuals. The moment in and of itself does not inspire action and change; it needs individuals to mobilize the moment towards change by deploying institutional affiliations and political capital. There are individual actors with different stakes in reforming hydropower policy in Nepal. Niti successfully identified the key individuals as “reform champions”—“influential partners with genuine interest in reform” (The Asia Foundation, 2010 p.12). Niti identified individuals such as Jyoti Baniya, Dilli Ghimire, Uttam Kumar Shrestha and Sujit Acharya, for example, who represented divergent interests, but who had a genuine willingness to engage in dialogue. Mr. Baniya, a consumer rights advocate, represented consumer groups. So did Mr. Ghimire. Mr. Shrestha, while supporting a consumer tariff increase, also represented the interests of the NEA as its ex-managing director. Mr. Acharya represented the private sector. Each of these individuals brought to bear both institutional affiliations and political capital, derived at times from personal networks.

c. Concerted Commitment

Within the political economy approach, the starting framework for analyzing the problem at hand is “thinking politically.” For Niti, recognizing a need for policy reform/restructuring and identifying the divergent interests at stake meant identifying the “political.” Politics in this context would mean the competing claims from the conflicting positions of the different stakeholders in tariff restructuring. The transition from “thinking politically” to “acting politically” occurs when a more sustained engagement is needed to effect policy change (Sturzenegger et al., 1998). Niti facilitated this transition by bringing the various parties into dialogue as a way to build coalitions and consensus. It was in this spirit that Niti took leadership in crafting occasions for a convergence of interests: a policy roundtable at the national level involving representatives of political parties, government, consumer groups and the private sector; local-level meetings with representatives of community groups and businesses; and a policy forum with the NHA. The crafting of these key occasions illustrate Niti's

commitment to spurring action and achieving results. For example, Ananda Pokharel and Sujit Acharya were present at all the different events organized by Niti geared toward the coalescence of interests. The timely presence of these two individuals during the drafting of the energy emergency bill was strategically vital to the PPA increase. Likewise, when the reinstatement of the ETFC gained momentum in 2011 under the new UCPN (M) government, Niti's decision to spotlight the consumer tariff increase as the most pressing agenda item, and its collaboration with the NHA to move that agenda forward, was pivotal in finally increasing the consumer tariff rate.

d. Future Engagement

Tracing Niti's involvement in the policy restructuring process reveals how important it is to understand the complexity of the policy regime within a broader political context that is unstable and rapidly changing: how formal and informal deployment of politics put into action by actors, ideologies, and institutions affects the field of policy. That is, policymaking does not take place in a vacuum. It exists in the contested field of knowledge and interest claims by the state, competing states within the state, and non-state bodies such as civil society, private sector, and community groups. The political economy framework holds that for any constructive intervention by a non-state institution to take place, it must be "policy intelligent"—critically conscious about the timing, the breakthrough moment for intervention, which is defined by The Asia Foundation (2010) as "...those largely unpredictable historical confluences of public and stakeholder opinion, related events, and the readiness of policymakers and the bureaucracy to implement reform" (p.11). After the identification and analysis of the breakthrough moment, it is equally crucial to translate that analysis into effective action for reform. This transition from analysis to action requires identifying actors who support as well as those who oppose reforms. Finally, intervention for policy reform should be geared toward creating conditions for building coalitions of diverse interests, largely by crafting formal and informal forums to take advantage of the moment and catalyze action. The Niti Foundation's experience strongly suggests that any future engagement to address deficits in a policy regime should be informed by a political economy framework can cope with and even exploit the uncertainty of the politics of policy making in order to produce good policy outcomes.

The Asia Foundation and its partner Niti Foundation, a Nepali non-profit organization that funds policy engagement, seek to support essential research, analysis, and action around pressing public policy issues in Nepal. We commissioned this occasional paper to apply a political economy framework to inform our mutual interest in hydropower development in Nepal through analysis of the politics of tariff restructuring. The paper points the way to a disciplined, practical approach to policy reform within a broader political context.

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The Asia Foundation

NEPAL
G.P.O. Box 935
Bhat Bhateni
Kathmandu, Nepal

www.asiafoundation.org



NEPAL
G.P.O. Box 24163
Baluwatar
Kathmandu, Nepal

www.nitifoundation.org