Involuntary Resettlement in Nepal: A Portfolio Review

Lars T. Soeftestad, Steve Gorzula, Rajan K. Shrestha

BACKGROUND

Nepal, a land-locked country, is not known to have major reserves of coal, gas, or oil. People have traditionally relied on biomass, and imported kerosene to meet their energy needs. It is endowed with a substantial potential for generating electricity, around 43,000 MW. At the present time, however, around 1 GW is installed.^{1/}

Almost 25 percent of the population live below the poverty line. Key reasons for the high poverty rates are unemployment and underemployment. Lack of jobs that pay a decent salary contributes importantly to poverty. The situation further is imperilled by the COVID-19 crisis. Enough and cheap electricity can contribute to creating employment, and contribute to improving livelihoods and living standards.

According to the World Bank, involuntary resettlement can, "depending on the case, include (a) acquisition of land and physical structures on the land, including businesses; (b) physical relocation; and (c) economic rehabilitation of displaced persons ..., to improve (or at least restore) incomes and living standards" (World Bank 2004:5). This quote points more clearly to what comes before relocation and rehabilitation, namely resource inventory/assessment, land acquisition, and compensation.

The paper does not focus on resettlement of refugees and migrants, in connection with biodiversity conservation, following natural catastrophes, and as a result of linear infrastructure projects (including transmission lines).

NEPAL'S HYDROPOWER SECTOR

The Beginning (1970s and 1980s)

Hydropower development in Nepal began early, in comparison with the neighbouring countries. We believe it is fair to give the honour for the beginning to Odd Hoftun, a Norwegian engineer who moved to Nepal at the beginning of the 1970s to work for a Norwegian missionary organization. He early on saw the potential for hydropower development. Over the next 40 years or so, this became his focus and work, but he could not have made it without many good helpers, in Nepal and in Norway (Svalheim 2015; cf. Bista 2009).

In the beginning there were no criteria, regulations or laws to follow, and no document process/ stream. During these early years the work was in some crucial ways easier, as compared with today. The early projects were run-of-river projects. In terms of engineering this was relatively easy to build. More importantly, these projects did not require much land, and local people living along the river did not lose land, and otherwise have subsistence factors destroyed.

Gradually, basically through learning from what happened elsewhere, the process around planning, constructing and operating these small plants became more formalized. A major push came around the end of the 1980s and the beginning of the 1990s.

^{1/} Source: <u>https://www.hydropower.org/country-profiles/nepal</u>. Data from 2019.

Formalization (1990s-current) ^{2/}

Several key public sector institutions began taking an interest, include the Min. of Energy (MoE), Dept. of Electricity Development (DoED), Nepal Electricity Authority (NEA), National Planning Commission (NPC), and Min. of Science, Technology and Environment (MoSTE). In between them, a number of necessary tasks, responsibilities, and activities were defined, demarcated, and formalized.

Starting in the 1970s and 1980s, and continuing in the 1990s, several Acts, Regulations, and Rules were adopted. Parallel, work on defining and formalizing Env. Assessment (EA) and Env. Impact Assessment (EIA) got under way. A number of steps were identified, beginning with screening, followed by the Initial Env. Examination (IEE), and review and approval of the IEE report. Under EIA scoping was identified, followed by ToRs and the EIA report.

Public participation was a requirement for EA and EIA. While formally initiated in a top-down process, by organizing local events in the project area, the goal are to involve local people in project preparation activities. All relevant local stakeholders – in public sector, private sector, and civil society – should be involved in the EA / EIA, and their involvement is facilitated through use of several specific methods or communication/interaction tools.

DoED and NEA manage the process of preparing, constructing, and operating hydropower projects through a process consisting of a number of steps or phases (Table 1).

No.	Phase	Comments
1	Survey license, Application	Necessary in order to survey, plan, and prepare a project.
2	Survey license, Approval	
3	Power Purchase Agreement (PPA)	Gives the COD date.
4	Initial Env. Examination (IEE) / Env. Impact Assessment (EIA), Implementation	The IEE is used for projects under 50 MW. Depending upon the project, it may be expan- ded into a comprehensive EIA.
5	IEE/EIA, Approval	Approval necessary before construction license is given.
6	Construction license, Application	Required in order to construct a project. DOED also uses both 'generation' and 'construction'.
7	Construction license, Approval	The application can be done prior to or parallel with the PPA.
8	Feasibility study	Guarantee that electricity will be produced.
9	Detailed Project Report (DPR)	Guarantee that electricity will be produced.
10	Financial Closure (FC)	PPA necessary requirement for FC.
11	Tenders floated	
12	Contracts awarded	The construction can commence.
13	Construction period	The project is now under construction.
14	Commercial Operating Date (COD)	Specified in the PPA. Project is commissioned and connected to the grid. NEA commences paying developers that signed PPAs.

Table 1: Projects and Implementation Phases

Sources: (i) DOED, (ii) personal communication: Saumitra Neupane, Amar Pandey, Nirjan Rai, Padmendra Shrestha.

Notes: (i) This is the implementation process that DoED and NEA manage, (ii) Phases 1-12 constitute a project's 'pipeline' phase.

^{2/} This section is based on Bhandari (2016), Govt. of Nepal (2006), Khadka et al (2013), Shrestha (2016).

Expansion (2000s-current)

While still in many cases being run-of-river type projects, an increase in the size began. A few storage dams began to be built, and so resettlement issues began to show up. Data from DoED for operating projects show the increase in capacity from 1994 to 2019 (Figure 1). While the number of projects has increased some, there is a comparatively very substantial increase in capacity.



The increase in terms of capacity becomes rather more pronounced when looking at pipeline projects (Table 2). The difference between total MW capacity of operating project and that of the total MW capacity of pipeline projects, is very substantial.

Licensing Phases	No. of Projects	Capacity (MW)
Plants, Operating	109 (4)	1,261.7 (55.1)
Survey License, Application	11 (8)	119.6 (80)
Survey License, Approved	260 (39)	15,357.5 (627.3)
Constr. License, Application	27 (4)	2.714.4 (20)
Constr. License, Approved	243 (20)	7,440.4 (119.5)
Totals	650 (75)	26,893.6 (901.9)
Totals (excl. op- erating plants)	541 (71)	25,631.9 (846.8)

Table 2 – Projects (Operating, Pipeline, and Under Construction), Overview

Source: DoED, at: <u>https://www.doed.gov.np</u>, 13 April 2021.

Notes: (i) Figures without parentheses refer to hydro projects, (ii) Figures in parentheses refer to co-generation, solar, thermal, and wind projects, (iii) DoED also uses the categories 'GON Project Bank', 'GON Ongoing Projects', and 'Other Projects', and these projects are not addressed.

INVOLUNTARY RESETTLEMENT, ANALYSIS

Two aspects of hydropower development in Nepal have to be addressed: (1) The possibility for relocation people, (2) The nature of involuntary resettlement.

Nepal is densely populated. Further, there is very little unused agricultural land left. In other words, even if government and project authorities would prefer relocation, and people would like to relocate, there are few opportunities available. Perhaps for this reason the government does not enforce relocation strongly. A further reason is that relocation is complex, difficult to manage, takes substantial time and resources, and may not be successful. Those responsible for constructing power plants are, for similar reasons, also not in favour. Finally, local people, except in the few cases where relocation is necessary, seem to opt for staying on. There appears to be a clear determination on the part of the government and project promoters, of avoiding relocation. In the recent past, with the emphasis on run-of-river type projects this was of course doable. In the future this promises to be a much harder job to manage.

It follows that references to "involuntary resettlement" in Nepal needs to be qualified. We have above argued, following the World Bank, that resettlement can include: (1) acquisition of land and physical structures on the land, including businesses; (2) physical relocation; and (3) economic rehabilitation of displaced persons, to at least restore incomes and living standards. If follows that the term "involuntary resettlement" refers to this overall process of land valuation, land acquisition, physical relocation, and economic rehabilitation. At the same time the term "resettlement" in a more limited sense refers to displacement. It is important to keep these two meanings of "resettlement" apart. In the context of Nepal where there is little displacement, so referring to land acquisition as "involuntary resettlement" does not seem appropriate.

The Kulekhani hydropower plant shows how compensation can go to the heart of family values and gender issues (Table 3). This table in general present some select projects and addressed briefly how they deal with the issues of land acquisition and payment of compensation.

No.	Project	Description
1	Dudh Koshi	Status: Operating; Capacity: 635 MW; About: Run-of-the-river, R&C: 162 hhs displaced, 988 hhs negatively affected; Majhi communities demand resettlement along the river (not just compensation)
3	Kulekhani	Status: Operating; Capacity: 60 MW; About: Kulekhani I-III and storage dam, R&C: 1,200 (possibly 3,500) persons were resettled, most worse off than before, local women wanted land as compensation would go to men who could not handle the amount of cash.
4	Middle Marsyangdi	Status: Operating; Capacity: 417 MW; About: Reservoir; R&C: 300 hhs lost land, 65 hhs relocated and received compensation, new homes, and professional training programmes and employment.
6	Tanahu	<i>Status</i> : Under construction; <i>Capacity</i> : 140 MW; <i>About</i> : Reservoir; <i>R&C</i> : 4,257 affected persons; 538 persons to be displaced; All received cash compensation.
7	Nalgad	<i>Status</i> : Survey license; <i>Capacity</i> : 417 MW; <i>About</i> : Reservoir; <i>R&C</i> : 1,286 hhs will lose all or part of the land; 657 hhs will lose structures while 607 of these will lose also land. The majority opted for compensation, relocation is not an option.
8	Upper Trishuli	<i>Status</i> : Survey license; <i>Capacity</i> : 214 MW; <i>About</i> : run-of-river; <i>R&C</i> : 154 hhs affected; 36 residential structures to be acquired.
9	Upper Karnali	<i>Status</i> : Survey license; <i>Capacity</i> : 900 MW; <i>About</i> : run-of-river; <i>R&C</i> : RAP prepared, 426 hhs to be affected, of which 56 hhs will be relocated, 217 physical structures will be affected
10	Budhi Gandaki	<i>Status</i> : Proposed; <i>Capacity</i> : 1,200 MW; <i>About</i> : Reservoir; on hold because of high costs and uncertainty related to relocation; <i>R&C</i> : 45,000 people to be displaced; Land acquisition ongoing, compensation planned.
11	West Seti	<i>Status</i> : Proposed; <i>Capacity</i> : 750 MW; <i>About</i> : Reservoir; <i>R&C</i> : approx. 1579 hhs to be relocated; approx. 11,160 persons downstream may be affected.

Table 3: Projects, Resettlement, and Compensation

Sources: (i) Project documents.

Notes: (i) Contains a select list of projects, information lacking or not available for several projects, (ii) Abbreviations: R&C = Resettlement and compensation, hh = household, PAF = project affected family.

ISSUES AND CONCERNS

As viewed from the outside, from the outside of the hydropower sector and from the outside of Nepal, several issues and concerns can be raised. They relate predominantly to the very substantial increase in hydropower development in scope as well as scale, as presented above. Some of these issues and concerns relate to climate change, environmental and social risk management, hydro development being based in outdated views and models, large projects versus small projects, and the importance of alternative energy source.

Finally, there is the issue of availability of data. We tried to get at data on involuntary resettlement, including compensation and relocation. We wrote to dedicated staff in DoED, National Planning Commission, and NEA, among others. Not one took the time to respond. One informant in Nepal argued that he could not help because he "did not know anybody in these organizations". It follows that we managed to gather precious few data. Further, we have not managed to clarify if a public sector institution is indeed collecting such data, and if so, why there is total secrecy and lack of transparency.

This lacuna of relevant data has several implications: (1) Nepal cannot rely on outside organizations and donors carrying out due diligence on single projects, (2) It represents problems for planning, overall and are regional/local levels, specifically for land management and provision of public services, (3) It represents a problem for new projects, in preparing baselines, (4) There is a concern that different projects, in applying the relevant legal instruments, interpret them differently (example: the phrase "resettlement was minimized", without further details, is commonly used in many project reports), and (5) Monitoring and evaluating of projects becomes difficult when baseline data on compensation and relocation are missing.

Literature

Bhandari, Ratan, et al. 2016. "Dam Sanctioning Process in Nepal". Mimeo.

- Bista, Shiva. 2009. Odd Hoftun's Perspective on Hydropower Development in Nepal. *Hydro Nepal: Journal of Water, Energy and Environment*, vol. 5, p. 50. <u>https://doi.org/10.3126/hn.v5i0.2490</u>.
- Government of Nepal. 2006. "A Handbook on Licensing and Environment Assessment Process for Hydropower Development in Nepal". Kathmandu, Nepal.
- Khadka, Ram B., et al. 2013. *Environmental Impact Assessment. Processes, Methods, and Practices of South Asia (Bangladesh, Bhutan, India, and Nepal)*. Pokhara, Nepal: School of Environmental Science and Management.
- Shrestha, Ratna S. 2016. Hydropower Development: Before and After 1992. *Hydro Nepal*, issue no. 18.
- Shrestha, Ratna S, et al. 2018. A Power Paradox: Growth of the Hydro Sector in Nepal. *Hydro Nepal*, issue no. 23.
- Svalheim, Peter. 2015. *Power for Nepal: Odd Hoftun & the History of Hydropower Development*. Kathmandu, Nepal: Martin Chautari.
- World Bank. 2004. *Involuntary Resettlement Sourcebook. Planning and Implementation in Development Projects*. Washington DC: USA: World Bank.