Dams, Rivers & People

CDM application by the 780 MW Nyamjang Chhu Hydro Project of Tawang: Is this the theatre of the absurd?

In April of this year, a group of Buddhist monks from Arunachal Pradesh came to Delhi. It takes them almost five days to reach Delhi from their remote Tawang district location. They were angry and were also looking for agencies that were the cause of their misery. What drove this troupe of robed monks to travel 2,000 km to Delhi, in this fiery state?

Organized underneath the banner, Save Mon Region Federation" (SMRF), based in the Tawang District of modern Arunachal Pradesh, the monks had been engaged in a fierce educational campaign for the past year. They had now come to the nation's capital to address what Secretary General, Lobsong Gyatsu, called, "the juggernaut of 15 large hydropower projects in the ecologically and geologically fragile, seismically active, and culturally sensitive Tawang region". ¹

Tawang, an internationally recognized holy place for the Buddhists, has been a contested region for many decades. At one point Tawang was actually a part of Tibet (with locals identifying themselves as Tibetan), both China and India were vying for control over the region. The locals were so suspicious of Chinese and also Indians, that the local administration then had their own way of dealing with spies and invaders, says

Other HEPs in Arunachal Pradesh that have recently (in Apr-May 2012) applied for CDM:

•	Tsachu-II (Tawang dist)	90 MW
•	Pachuk-II (Kameng)	60 MW
•	Marjingla-II (East Kameng)	39 MW
•	Marjingla Lower	48 MW
•	Tsachu-I Lower (Tawang)	18 MW
•	Tsachu-I	48 MW
•	Tsachu-II lower	45 MW
•	Nefra, (West Kameng)	120 MW
•	Pakke Bung I (East Kameng)	48 MW
•	Pakke Bung II (East Kameng)	15 MW
•	Pakke Bung III (East Kameng)	36 MW
•	Pakke Bung IV (East Kameng)	12 MW

British officer Capt Baily in his account of his travel to the area in 1913. Since they couldn't behead the offender (it would be against the Buddhist value of non-violence), they would simply tie him in a sack, and dispose of him in the river, "claiming "the river has done it".

Today, a different kind of attack has been mounted on Tawang, and this time the river cannot save the monks, for the river itself is in danger. The culprit isn't so straight forward anymore either— Locals have largely accepted their region as part of Indian territory, and call themselves Indians², yet the government of

¹ "Among the total 148 MoUs/MoAs on Hydro Electric Projects singed by the state Govt. (till July 2011) in a short period, 15 of such projects with more than 3500 MW are in Tawang District," the Federation laments.

² On May 9, 2012 Tarun Vijay, Member of Parliament, raised this issue in the Rajya Sabha. He said, "Isn't it the duty of the government to listen to this big movement which has been led by these monks, and attend to their issues?...The government ministers tells me not to bother about this—they say 'Maybe China is instigating this movement'. Is this responsible talk? Even if China is instigating them, isn't it the responsibility of the central

government to address their needs? But these people are surely Hindustani,

India, multinational energy corporations, and potentially even the UNFCCC are financing a major assault on the resources of the area.

The 780 MW Nyamjang Chhu Hydro Electric Power Project (NCHEPP), being pursued by the multinational energy giant, Bhilwara Energy Ltd, is the latest of the 15 HEPs to have gained clearance. The company has floated "NJC Hydro Power Limited" for the operation the NCHEPP, is now in the process of applying for Clean Development Mechanism (CDM) status under the United Nations Framework Convention on Climate Change (UNFCCC). Under UNFCCC, projects in developing countries that are CDM-certified can earn certified emission reduction credits (CERs), which are saleable and can be used by industrialized countries to meet part of their emission reduction target under the Kyoto Protocol.

But a quick examination of the facts shows that there is nothing clean about the mechanism Bhilwara Energy is employing in the NCHEPP. The project proposes to divert the flow of 35 km of the 40 km stretch of Nyamjang Chhu River (that flows through India) into a 23.5 km long head race tunnel. The project has a design discharge of 87 cumecs, which means that (in a 90% dependable year) during 60 of 120 monsoon days there will be no downstream water release. And effectively, for the rest of the year, the Nyamjang Chhu would remain dry, even if the company were to release some water under the garb of environmental flows. Incidentally, the Nyamjang Chhu river enters India at the elevation of 2220 m and the project FRL is 2114.9 m, just within about 100 m elevation difference from the border. The project is likely to affect area between Line of Actual Control and Mcmohan line and lead to some disputes.

There is also the possibility of downstream dispute as the river Tawang enters Bhutan a couple of kilometers downstream from where the tail race channel of the project meets the river. Bhutan will face the downstream impacts, and there has been no assessment of the downstream impacts singly or collectively, either for Bhutan or for further downstream Assam.

Not to mention, the project would engulf 89 hectares of community-owned forest land and lead to felling of 9,127 trees. Since the project is located in a "seismically active" area prone to landslides, the blasting involved in tunnel construction and the widening of over 60 km of roads, could lead to devastating geological impacts. The Save Mon Region Federation and the WWF-India have also raised critical issues related to a range of negative effects that the dam may inflict upon Tawang's unique wildlife and biodiversity.

they are swearing by the colors of our national flag, and are using our slogan 'Jai Hind!' They speak in Hindi." He prodded, "Do you want to create a background in Tawang for an anti-India movement?" See: http://164.100.47.5/newdebate/225/09052012/12.00NoonTo13.00pm.pdf

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In 2011 a team from WWF-India confirmed what locals had suspected for a long time: the Black-necked crane, *Grus nigricollis*, an endangered and ecologically threatened species, has a winter dwelling in the Zemithang Valley of Tawang. Google images of the area have subsequently confirmed that its wintering spot is in direct overlap with the proposed site of the NCHEP barrage! Amazingly, the Expert Appraisal Committee of the Union Environment Ministry for River Valley Projects, while recommending approval for the project, managed not to notice any of these aspects! But this is not the first time that they have shown their capacity to ignore such vital aspects.

What will this mean for the fate of the local people and the eloquent, red-crowned, Black-necked crane? Seeing how the Zemithang Valley dwelling is one of two Indian winter locations for the crane (the other being in Sangti, also in Arunachal Pradesh), the picture cannot be good. For the locals who have formed small livelihood initiatives centered on the Black-neck Crane like ecotourism and bird watching, and the monks who believe that the Crane is an incarnation of the sixth Dalai Lama, the social cost would be tremendous.



The Black-necked Crane is the last known crane to have been discovered by the scientific community. © Pankaj Chandan/WWFIndia

In the letter the monks handed SANDRP during their trip to Delhi in April 2012, the Federation has pointed out that it's not only the rare crane that needs to be looked after when considering the coming dams—"Tawang is also home to rare Himalayan Wild Plant species like Rhododendron." And, "Tawang is the only place in the world where all different varieties of Rhododendron are grown."

They also mention that the Mago Chu Valley, site of Tsachu-II (which has also applied for CDM status), "is the only known region of the world to have all three Goral species". Rare primate species like Tawang Macaque, Rhesus Macaque, snow leopards, & the Himalayan Marmot, to name a few, also make their habitat in Tawang. All of this crucial information has been conveniently omitted from the project EIA & the company's bid for CDM. The PDD goes as far to claim that the "Nyamjang Chuu river acts as a barrier to wildlife movement" so therefore the dam "will not create any new barriers"! The EAC seems to have a good competition with the project developer.

The facts that the monks, international agencies like the WWF, & the International Snow Leopard Trust (Seattle, USA) have unburied could be of particular use to the movement. The project has failed to obtain wildlife clearance from the Arunachal Pradesh Wildlife Board (as required under the Wildlife Protection Act of 1972). Nearby projects like NHPC's 600 MW Tawang-I and 800 MW Tawang-II HEPs, have come to a virtual halt in the Forest Advisory Committee, due to the adverse impact they would have on wildlife. If someone had brought the issue of the Black-necked Crane to the attention of the FAC when it was considering NCHEPP, would it have faced same fate?³

With respect to the 15 dams, we are now demanding nothing short of an independent, cumulative impact assessment (CIA). The MoEF must fulfill the promises it made in the 2010 Public Consultation on Northeast dams held in Guwahati, where the then Environment Minister Jairam Ramesh said, "Individual environmental clearances regarding HEPs in the North East region would only be considered after having prior river basin studies which will also examine cumulative downstream impacts of the project." Akhil Gogoi, Secretary General of Krishak Mukti Sangram Samiti wrote to Jairam Ramesh in Feb 2011, reminding him of his promise to the people of the North East but still no action has been taken towards realizing a CIA.

It's clear why groups like KMSS from Assam have become increasingly involved in the agitation against projects like the 780 MW NCHEPP. Without a thorough impact assessment on NCHEPP and the other proposed dams, how can we know what daminduced fluctuations in flow will have in store for downstream Manas (which flows via Bhutan, to the Assam)? The Manas is "not only one of the important tributaries of the Brahmaputra, but flows through the Manas Tiger Reserve, which is also a World Heritage Site and an Important Bird Area as per the [BirdLife] International criteria" says Gogoi.

From here on, the movement against NCHEPP is likely to grow, both locally and internationally (as stated before, Tawang is the global revered place for the Buddhist faith). On April 4, 2012 there was a public protest and rally in Tawang invoking mass turnout from the ranks of both students and locals. Five groups have signed onto SANDRP's objection to NCHEPP application for CDM (including KMSS & Save Mon Federation). The UNFCCC has a dicey past in India, granting CDM to projects that are not additional, not sustainable and have faced mass opposition including Bhilwara's Allain Duhangan, Jaipraksh Associate's Karcham Wangtoo & SJVN's Rampur HEPs. Maybe this time the rising tides will be impossible to ignore.

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 $\underline{http://awsassets.wwfindia.org/downloads/regional_cooperation_for_conserv_ation_of_the_black_necked_crane.pdf$

³ Jairam Ramesh, then Minister of Environment and Forests, was present at the WWF-India tri-country workshop on the Black-necked Crane (he even conducted the inauguration ceremony)! RameshJi made high promises to protect and conserve the Indian habitat of the ecologically threatened species. See the full report here: