Baglihar and the Politics of Water in Pakistan – A Historical Perspective

Haris Gazdar¹

The Baglihar Dam issue between Pakistan and India affects fundamental economic and political interests of the Pakistani state. It is not surprising that the two countries have reached a diplomatic stalemate that threatens the wider process of negotiation. In fact, what is surprising is that the nonchalance of the Pakistani government on the matter lasted for as long as it did. There are good reasons for believing that a democratic government in Pakistan would have been more alive to the issue. The military government's belated notice of the dispute might be a ruse against a further deepening of dialogue with India, rather than a serious reckoning of the issue itself.

Dependence on river flows

Pakistan's economy – despite much diversification away from agriculture – continues to rely heavily on the primary sector for employment as well as for industrial inputs. Agriculture still contributes around a quarter of the national income and employs over two-fifths of the workforce. Textiles remain the most important manufactured exports and much of Pakistan's advantage in global markets is derived from the domestic production of cotton. The agricultural heartland – the plains irrigated areas of the provinces of Punjab and Sindh – account for nearly nine-tenths of wheat, and virtually all of cotton and rice production.

The canal irrigation system is the mainstay of this agrarian economy. The canals were developed from the mid- 19^{th} century onwards in Punjab and from the 1920s onwards in Sindh. They expanded arable area by converting former wasteland into highly productive land. Canal-based irrigation is particularly important in central and southern districts of Punjab, and all of Sindh – precisely the regions that produce much of the country's wheat and cotton. The northwest of Punjab is rain-fed or *barani*, whereas the northeast of the province also enjoys high rainfall in addition to sustainable groundwater resources.

In agro-climatic terms, much of central and southern Punjab, and all of Sindh are semi-arid regions. In addition, groundwater resources in Sindh and southern Punjab tend to have a high saline content making them unusable for irrigation. It is broadly true that the further south one goes down the Indus basin, the higher the exclusive reliance on surface water irrigation supplied through the canal system. Over much of Sindh the presence of canal water marks the difference between desert and productive cropland. Crop predictions in Pakistan's agricultural heartland, and therefore, economic growth projections, do not rely very greatly on expected rainfall in these areas, which would be deserts if rain was the main source of freshwater. The key variables of interest are rain, snowfall and ice-melt in the upper mountainous reaches where the river flows originate.

A striking feature of Pakistan's geography is that virtually all of the plains areas in the country – from the Peshawar valley in the north to the Sindh coastline – are part of a single hydrological system, namely the Indus Basin. All of the surface water flows in

¹ The author is associated with the Collective for Social Science Research, Karachi.

three of the four provinces (NWFP, Punjab and Sindh), and a major proportion (30 per cent) of the flows in Balochistan drain into the Indus Basin. Irrigation developments after independence, particularly in the light of riparian disputes with India, have led to the further integration of the Indus Basin into a unique water budget constraint.

The partition of Punjab and the division of the irrigation system

The partition of British India meant that the Indus Basin was now to be shared between two sovereign entities. Besides these two countries there was the state of Jammu and Kashmir, whose status was not decided in August 1947, but which too formed part of the Indus Basin. Riparian issues between Pakistan and India were first anticipated with reference to the future management of Punjab's irrigation system. Failure to arrive at a settlement before independence led to a "standstill" agreement that maintained existing flows till 31 March 1948. The standstill agreement lapsed without progress on a final settlement, and Indian Punjab promptly stopped downstream flows on the Sutlej and the Upper Bari Doab canal systems, triggering a crisis in Pakistani Punjab.²

Urgent negotiations followed, and new agreements were reached on 18 April 1948 between the two provincial governments for the restoration of flows to Pakistani Punjab. The wording of the new agreements implied that the West Punjab government had accepted East Punjab's right of pre-emption over supplies from the headworks located on the latter's territory. While West Punjab did not subsequently ratify these agreements it was widely perceived that Pakistan had compromised an otherwise strong riparian claim in return for the immediate expedience of restored irrigation supplies for the next crop.³ Chastened by this episode, West Punjab started construction of the 100-mile long Bombanwala-Ravi-Bedian-Dipalpur (BRBD) Link Canal in 1948 for the diversion of Ravi flows to the Sutlej in anticipation of future stoppages by East Punjab. The link canal was a radical engineering solution to a seemingly intractable political problem.

The early crisis with respect to the Sutlej and Upper Bari Doab canal systems and its resolution contained the kernel of subsequent political as well as technical directions of irrigation development in Pakistan. The World Bank-brokered Indus Water Treaty (IWT) between Pakistan and India in 1960 was the culmination of these developments. The IWT awarded all flows of the three eastern rivers of the Indus Basin (Ravi, Beas, and Sutlej) exclusively to India, and Pakistan received exclusive right to the three western rivers (Indus, Jhelum and Chenab).

The Indus Water Treaty myth

This "solution" was, in fact, very close to the Indian position held from the outset, and was in stark contrast to internationally accepted principles of riparian division. Pending the settlement of the Kashmir dispute, India actually had no riparian claim on the western rivers to begin with. The contest should have been over rival riparian

² Shah (1998) provides a useful compilation of documents pertaining to Indo-Pak riparian negotiations from 1947 till 1960.

³ The West Punjab delegation came under severe criticism at home for having adopted an indifferent attitude with regard to long term interests of the state (Shah, 1998).

claims on the three eastern rivers that traversed both India and Pakistan. The point of riparian agreements is to protect the entitlements of the lower riparian from actions of the upper riparian. The lower riparian, by definition, has no means of interfering with the entitlements of the upper riparian. The IWT, by awarding all of the eastern rivers to India, was hardly a model of just arbitration between riparian parties

A myth has grown that the IWT is a model of good neighbourliness in an otherwise conflict-ridden bilateral relationship. It is common for contemporary commentators to repeat analyses such as: "the IWT [is] perhaps the most successful confidence-building measure (CBM) between the two countries [having] remained intact all these years, surviving two wars and several phases of conflict".⁴ In fact, such judgments, uninformed as they are about the true political and technical basis of the IWT, tend to obscure the profound absence of cooperation between the two states on any substantive problem. The test of the treaty "holding" through decades of conflict would be that there were no serious violations on either side. The admirers of the treaty appear to be unaware that the terms of the treaty actually require virtually no cooperation between the two parties.

Pakistan, being the lower riparian, is prevented from violating the terms of the treaty by geography. It cannot prevent the flows of the three eastern rivers allocated to India, because it cannot control those flows. India, on the other hand, has had the geographical possibility of violating the treaty as it controls the upper riparian territory of the three western rivers. It has been constrained by two factors. First, India's control over these three rivers is derived from its control over part of the state of Jammu and Kashmir, which is itself a contested territory in terms of international legality. Second, the course run by western rivers through Indian-controlled territory is mountainous and, therefore, technically challenging. The flow of the Indus is well nigh unstoppable in the reaches of the river under Indian jurisdiction. There are technologically feasible (though costly) means for holding, but not significantly diverting, the flows of the Jhelum and the Chenab.

Out of the six major rivers of the Indus Basin that traverse territories under Indian and Pakistani jurisdictions, one river (the Indus) prohibits any interference due to its geography, and three rivers (Sutlej-Beas and Ravi) were awarded entirely to India. The remaining two – i.e. Jhelum and Chenab where the upper riparian can feasibly interfere with the entitlements of the lower riparian – both have unresolved ongoing disputes between the two parties. While discussing the Baglihar issue, it needs to be recalled that Pakistan has already taken the Wullar Barrage/Tulbul Navigation Project dispute on the Jhelum to the Indus Water Commission in 1986.

The engineering "solution"

Why did Pakistan agree to the IWT - a treaty which, from the point of view of the lower riparian simply sanctions the outright theft of the three eastern rivers on the part of the upper riparian? The answer to this political conundrum lies in the engineering "solution" first tested with the BRBD Link Canal. In compensation for giving up its riparian rights, Pakistan received international financial assistance for the construction of storage sites and link canals to divert flows from the three western rivers to the

⁴ Zafar Abbas (2005), "Negative Baggage", <u>The Herald</u>, February 2005, Karachi, p 37.

eastern rivers. The Treaty led to the construction of several link canals as well as storage and power generation sites in Pakistan. The Water and Power Development Authority (WAPDA), which is the largest civilian employer in the country, was set up as a direct consequence of the IWT with international financial and technical assistance.

The BRBD Link Canal had shown that it was technically feasible to divert the flow of the Chenab and the Ravi to make up for the loss of the Sutlej-Beas waters to India. Around a dozen link canals running to several thousand kilometers were built across the doabas of Pakistani Punjab, bringing water from the Indus to the Jhelum, from the Jhelum to the Chenab, and the Chenab to the eastern rivers. The Indus basin in Pakistan became an integrated hydrological unit across its length. It became technically feasible, in effect, to make good water shortages in the Sutlej by turning a valve further up on the Indus.

The IWT, moreover, envisaged not only a spatially integrated irrigation system, but also a unified water budget constraint over time. It was found that the western rivers, particularly the Indus, had great seasonal variations in flow, and that a large proportion of the annual water flow was "wasted" to the sea during the high flood summer season. Water storage capacity was required, therefore, to allow for the smoothing of consumption across the seasonal cycle. The IWT led to the construction of several large reservoirs on the western rivers – Mangla on the Jhelum, and Jinnah Barrage and Tarbela on the Indus – in order to store water for regulation and diversion.⁵

The other riparian issue

While the IWT provided an engineering solution to the riparian issue that had arisen between Pakistan and India – initially between the post-partition Pakistani and Indian provinces of Punjab – there was another riparian dispute that was dealt with in a more cavalier fashion. With the progressive development of the Indus basin in the 19th and early 20th centuries, a question had arisen even during British colonial government, of water sharing between the provinces of Punjab and Sindh. A series of negotiations had led to the finalization of a draft agreement between the two provinces in 1945. Although this draft agreement was not ratified by the provincial legislatures, it remained the main reference point in issues relating to the inter-provincial division of water resources.

Sindh being the lower riparian in this instance had good reasons to be concerned about future developments in the upper riparian region. All five rivers of Punjab drained into the Indus, which for Sindh, was virtually the only source of water. Sindh's water entitlement was affected, therefore, not only by withdrawals upstream from the Indus intself, but by withdrawals from any of the other Punjab rivers as well. The construction of large-scale barrages at Sukkur, Guddu and Kotri, and the opening up of vast tracts of former wasteland for cultivation led to a massive transformation of the Sindh economy and demography.

⁵ The loss to India was calculated at around 20 MAF in the summer months. Mangla and Tarbela taken together were designed to have a storage capacity of around 15 MAF (Lieftinck et al, 1968). Mangla and Tarbela are also major sources of power generation for Pakistan.

The sensitivity of the riparian issue in inter-provincial relations in Pakistan was registered early on, when members of the Constituent Assembly from Sindh protested at their province not being consulted over the construction of the BRBD Link Canal between the Ravi and Sutlej rivers.⁶ These early protests proved to be prescient. In the meanwhile, however, constitutional government was suspended in Pakistan in 1954, and during its period of suspension the four provinces in the western wing of the country were merged into a single province known as West Pakistan. The military-bureaucratic oligarchy had taken over, and political representatives particularly from the provinces were to be contemptuously sidelined from power. When Pakistan entered World Bank-brokered negotiations with India over the Indus Water Treaty, the inter-provincial riparian issue had temporarily disappeared through bureaucratic fiat, and Sindh's riparian interests went unrepresented. It has been argued that ignoring the historical riparian claims of Sindh vis-a-vis Punjab (East and West Punjab taken together), led to the undermining of Paksitan's riparian claim vis-a-vis India.⁷

The international financiers of the IWT who took the lead in designing and implementing the engineering solution did take into consideration the earlier attempts at riparian settlement between the provinces. Water distribution along the Indus basin was made subject to the provisions of the Sindh-Punjab draft agreement with one ingenious proviso: the terms of that agreement would apply <u>after</u> taking the works arising from the IWT into account.⁸ Since the IWT works were designed to fully compensate for the losses suffered by West Punjab, it followed that the loss was to be made up from river flows downstream of that province.

This was envisaged as a trivial issue both in terms of legality as well as in terms of the overall availability of water. The main technical argument was that nearly 55 MAF on Indus flows were "wasted" – i.e. discharged into the sea -- during the peak summer months.⁹ Storage sites such as Mangla and Tarbela dams (as well as others to be constructed in the future) would ensure adequate supplies to the entire system, and particularly to the lower Indus region (as Sindh was then known) by simply holding over water that would otherwise have been "wasted".¹⁰ The legal constraint was not binding, in any case, since Sindh had ceased to exist, during that period, as a separate riparian unit. The IWT encouraged the view that water distribution along the system ought to follow simple cost-benefit criteria rather than any notion of prior entitlements.

The persistent water crisis

One Unit – or the merger of the four west Pakistani provinces into the province of West Pakistan – was not to last. The original provinces were restored in 1969, and a federal constitutional structure was adopted in 1973. With the restoration of the

⁶ Shah (1998).

⁷ Shah (1998).

⁸ Lieftinck et al (1968) is the "masterplan" prepared by World Bank consultants after extensive surveys, for the post-IWT rehabilitation and development of West Pakistan's irrigation and power sectors. ⁹ Lieftinck et al (1968) = 22,22

⁹ Lieftinck et al (1968), pp 38-39.

¹⁰ The idea that discharges to the sea represent "wastage" remains at the core of the water debate in Pakistan, and is now contested vigourously by those concerned about the marine economy and ecology (Brohi, 2003).

provinces the riparian contest within Pakistan re-emerged as an inter-provincial issue. Matters came to a head in the 1980s, when, in line with the master-plan for irrigation development laid out as a consequence of the IWT, the military government of General Zia-ul-Haq announced the inception the Kalabagh Dam on the Indus, the third large-scale storage and hydroelectric reservoir, after Mangla and Tarbela. The Kalabagh Dam issue became immediately controversial, and led to large-scale protests in Sindh, where it was seen as a further attempt by the Punjab-led military government at encroaching upon the lower riparian's water entitlements.

Kalabagh Dam was not constructed but it had led to powerful political mobilization around the issue of water distribution between the provinces. Water allocation remains a critical factor in inter-provincial politics in Pakistan. The 1990s saw persistent water shortages caused partly by lower than average supplies upstream, partly by deterioration in physical infrastructure, and partly due to the institutional decay in the management of the irrigation system. In rural Sindh, the effect of these persistent water shortages was to radicalize further, political opinion across classes and party lines with respect to riparian issues.

The Kalabagh Dam issue, after remaining on the sidelines for over a decade, was raised again in 1998 by Prime Minister Nawaz Sharif who announced his eagerness to go ahead with the project. His own party's representatives in the Sindh province rebelled and Sharif was forced to retract his announcement. Recently General Musharraf has expressed his support for the project, but he too faces resistance from among his own supporters in Sindh. It is widely understood that inter-provincial water distribution is a potentially explosive issue in Pakistan, and insensitive handling of this issue can have serious repercussions for the stability of the federal political system.

Instincts of military versus political governments

The effective functioning of the Indus basin irrigation system is clearly critical to the economic prosperity and political stability of Pakistan. The Indus basin, particularly after its integration into a unified water budget, not only defines the geography of the country, but is also, arguably, its most important economic asset. Its efficient and equitable management is a fundamental condition for the maintenance of harmonious relations between the federating units of the state. It might be expected, therefore, that the Pakistani state would define its long-term "national interests" quite largely in terms of the preservation, sustenance and development of the Indus basin irrigation system.

The current Baglihar Dam dispute with India, as the Wullar Barrage/Tulbul Navigation Project dispute before it, might be regarded as a "core issue". After all, from the Pakistani state's point of view, India's line of action on the riparian issue hardly warrants a high degree of trust in good neighbourliness. From the unilateral suspension of the 1947 Standstill Agreements, the unequal IWT, and the lack of previous disclosure on Wullar/Tulbul and then Baglihar, Pakistan might have good reasons to suspect Indian motives. It is striking, therefore, that even while it remained alert and belligerent towards India on other diplomatic, political, and military fronts,

the Pakistan government maintained silence on the Baglihar issue for a period of nearly five years while work on the project continued apace.¹¹

It is perhaps no coincidence that Pakistan's apparent lack of vigilance with respect to Baglihar occurred on the watch of a military government. The IWT too was agreed when a general was at the helm of affairs, and it was widely suspected that Ayub Khan took a personal interest in the finalization of the agreement, in the face of technical and diplomatic advice. Military governments have been disdainful of Pakistan's federal political structure, which they regard as a source of disunity and weakness. But it is through the medium of provincial politics that the concerns farmers in general, and those in various segments of the irrigation system in particular, get transmitted.

The main populist political parties in Pakistan – particularly the Pakistan Peoples' Party (PPP), which continues to garner the largest share of the popular vote – are forced to respond quickly to the concerns of the agricultural lobby. While in Punjab this lobby consists mainly of large and middle peasants, in Sindh, particularly on the water issue, it encompasses the entire spectrum of classes from very big landlords down to the agricultural labourers. Moreover, these parties are sensitive to issues of inter-provincial distribution, since they either enjoy support in the various provinces (e.g. the PPP), or because they aspire to build support across provinces (e.g. the Pakistan Muslim League – Nawaz).

Even an economically savvy military government is capable of paying greater attention to increased flows of foreign exchange while at the same time remaining unmindful of reduced flows down the irrigation system. Also, crucially, a military government might quite easily conceive the notion that water shortages due to Indian actions on the Jhelum or the Chenab might be counteracted through new engineering works on the Indus -- something a political civil government will only contemplate at its peril.¹²

Conclusion

The belated protest on the Baglihar Dam issue on the part of Pakistan's government signals one of two (opposing) possibilities. First, that the issue was ignored earlier as a gesture of goodwill towards the peace process until such a time as confronting it became inevitable. This is somewhat unlikely, since the project's inception was already in the public domain at least since 2000 – well before the current peace process started. Second, confronting the project was not seen as an important priority as it did not challenge the military government's definition of "core national interests". If so it might be hard to avoid the conclusion that the timing of the current stance taken by the Pakistan government has more to do with its disillusionment with the broader bilateral negotiation. The Baglihar dispute might be the pretext rather than the cause of a cooling off in the peace process.

¹¹ The commissioning of the project in 2000 was hardly a state secret. Allocations were made in the budgets of Indian state of Jammu and Kashmir, and foreign consultant and engineering firms were publicly invited to bid.

¹² The parallels between the Ayub and Musharraf governments are striking in this regard.

This does not mean, of course, that relations between India and Pakistan can only improve if the latter were to remain indifferent to its substantial riparian concerns visa-vis the former. In fact, it would serve the long term interests of both the states -- as well as of the federating units within Pakistan -- if the lower riparian were to robustly promote and defend its riparian claims and entitlements as the "core" issues of national interest.

Bibliography

Zafar Abbas (2005), "Negative Baggage", The Herald, February 2005, Karachi.

- Brohi, Sikander (ed) (2003), <u>Indus Flow Downstream Kotri Barrage: Need or</u> <u>Wastage?</u> (Karachi: SZABIST Center for Information and Research).
- Lieftinck, Pieter, A. Robert Sadgove, and Thomas C. Creyke (1968), <u>Water and</u> <u>Power Resources of West Pakistan: A Study in Sector Planning</u> (Baltimore: Johns Hopkins Press).
- Shah, Sayid Ghulam Mustafa (1998), <u>Indus Basin and Kalabagh Dam</u> (Karachi: Ilmi Printers and Publishers).