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**NAAC ACCREDITED 'A' GRADE**



<b>TOPIC:</b>	<b>RIVER WATER SHARING DISPUTE</b>
<b>COURSE TITLE:</b>	<b>ENVIRONMENTAL SCIENCE (HONS.)</b>
<b>PAPER:</b>	<b>CC - 3</b>
<b>UNIT:</b>	<b>5</b>
<b>SEMESTER:</b>	<b>2<sup>ND</sup></b>
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## Introduction

India is a riparian country having several rivers flowing in all directions and with varied amount of water. Most of the major rivers of northern India, like Ganges, Yamuna, Satluj, Sindh etc. are perennial in nature and reported to have surplus or near surplus water flowing through those. The maximum water surplus river is known to be the River Brahmaputra flowing in the North-eastern corner of the country. On the other hand major rivers of central and southern region like Godavari, Cauvery, Mahanadi, Narmada, Krishna, Pennar etc. are generally fed by the monsoon water and effluent groundwater and therefore are predominantly ephemeral in nature.

Name of the river basins	Avg. annual potential in the river (BCM)	Per capita annual Water Availability (CM)
Indus (Upto boarder)	73.31	1438
Ganga	525.02	1202
Brahmaputra & Barak	585.60	13636
Godavari	110.54	1683
Krishna	78.12	1056
Cauvery	21.36	599
Pennar	6.32	535
East flowing rivers between Mahanadi & Pennar	22.52	784
East flowing rivers bet. Pennar & Kanyakumari	16.46	301
Mahanadi	66.88	2067
Brahmini & Baitarani	28.48	2388
Subarnarekha	12.37	1082
Sabarmati	3.81	298
Mahi	11.02	863
West flowing rivers of Kutch, Luni	15.10	562
Narmada	45.64	2552
Tapi	14.88	826
West flowing between Tapi & Tadri	87.41	2785
West flowing between Tadri & Kanyakumari	113.23	2862
Minor river basins of Bangladesh & Barma	31.00	16990
<b>Total</b>	<b>1869.35</b>	<b>1820</b>

*Source:* Central Water Commission, as cited by the Task Force on Interlinking of Rivers, MoWR, 2003.

In an agrarian country like India, the state economy is directly linked with the irrigational potential and, and therefore the share of water from the river basins become a critical issue of dispute among different state through which any inter-state river flows. The same is also application in case of international river water share, as in case of India and Bangladesh with the water of river Ganges, Brahmaputra, Tista, Torsa etc.

However, owing to higher water availability in the rivers basins of northern India, the river water sharing conflicts are of relatively intensity, although are the instances of inter-state dispute regarding water share among Punjab, Haryana, Rajasthan and Himachal Pradesh. But, in contrast there are instances of long legal battles among southern states like Karnataka, Maharashtra, Andhra Pradesh, Telengana, Tamilnadu, Puducheri and Kerala on share of water from various rivers. Among all those, the Cauvery and Krishna river water sharing disputes had been most intense and prolonged from decades together. Even though in recent years resolutions have been made, but still there are underlying dispute among the people of those state regarding the water issue.

## Krishna River water sharing dispute

The Krishna river, another major river of the deccan plateau travels around 1300 kms from the Mahabaleswar area of the state of Maharashtra to the Bay of Bengal at coastal Andhra Pradesh. It feeds 68800 km<sup>2</sup> in Maharashtra, 1,12,600 km<sup>2</sup> in Karnataka and 75600 km<sup>2</sup> area in Telengana and Andhrapradesh together. En-route it travels 303kms, 480kms and 517 kms in Maharashtra, Karnataka and Andhra Pradesh (Now Andhra Pradesh & Telengana together) respectively.

With such a huge river basin all these riparian states have been enjoying their rights over the years on the water of the river, mostly following the agreements set among the earlier States of Bombay, Mysore and Hyderabad. But, in the post independence era, with introduction of different democratic states since 1956, and following different water resource development programmes conflicts triggered out among the states concerned. Construction of several dams in the upper stretch of the river constrained the water availability in the downstream. To resolve these conflicts a Krishna Water Dispute Tribunal (KWDT) was formed in 1969 which put forward its recommendations in 1976 and awarded 560 TMC, 700 TMC and 800 TMC water to Maharashtra, Karnataka and the then Andhra Pradesh state, considering 75% dependability ratio.

However, with advent of further development and increased demand for water, conflict continued. The state of Karnataka opted for increasing the height of Almatti dam from 519 meter (above MSL) to 524.25 meter (above MSL) to harvest a few more TMC of water from the river Krishna, while it was expected to pose threat on the water availability to other dams and area in the lower basins particularly during the dry time. Therefore, this issue further aggravated the interstate dispute. In 1999 the supreme court ordered formation of another tribunal to resolve demands of the conflicting states and in 2004 KWDT was reconstructed as KWDT – II. In December, 2010 this tribunal revised the provisions for water sharing among states with 65% dependability and allowed Karnataka to raise the height of Almatti dam. KWDT awarded Maharashtra, Karnataka and the then Andhra Pradesh 666 TMC, 911 TMC and 1001 TMC water respectively. Although, Maharashtra and Karnataka states are in full acceptance of the shares but the Andhra Pradesh government expressed their dissatisfaction, as raising the height of the Almatti dam pose the threat of less water availability in the downstream river during dry months of the year.

Further, in 2014 after splits of Andhra Pradesh as Andhra Pradesh and Telengana state, they claimed a restructuring of the share among four states instead of the formerly three. In 2017 the claim has been denied in court and keeping Maharashtra and Karnataka out of question, the Andhra Pradesh share (i.e. 1001 TMC) has been asked to be distributed among the two newly formed states.

This Krishna Water dispute, however, is considered to be one of the better managed interstate water sharing conflict of the country.

## Cauvery River water sharing dispute

The Cauvery, or Kaveri River, originates from Talakaveri (Thalakavery) in Kodagu district in Karnataka. It has a drainage area of around 81,155 square kilometres which is spread across four states – Karnataka (34,273 square kilometres) Tamil Nadu (43,867 square kilometres), Kerala (2,866 square kilometres) and Puducherry (149 square kilometres). Its main tributaries are the Harangi, Hemavati, Kabini, Arkavathy, Amravathi, Lakshmana and Tirtha. The river and its tributaries together form the Cauvery river system. There are around 86 dams on the Cauvery River and its tributaries. Of those dams, 37 have been constructed after 1974.

About 17,356 villages fall in the Cauvery basin. Coimbatore, Mysore, Salem and Trichinapally are among the main cities in the Cauvery basin region. Taking into account the 2011 census records, one can estimate that more than around 50 million people from Karnataka and Tamil Nadu are living in this basin area at the present time. (Adopted from, Rajan, 2018).

The water of Cauvery, therefore acts as lifeline to four states Karnataka, Tamil Nadu, Kerala and Puducherry and the conflict on sharing of river water among the states is perhaps the most prolonged battle being fought over.

The Cauvery water conflict is different from any other water sharing dispute in India, as unlike others, which are being fought over the sharing of untapped water potential, in this case the conflicts the potential of water stands already utilized to maximum extent. The dispute over the Cauvery water began in the 19th century between Mysore State (now in Karnataka) and the Madras presidency (now Tamil Nadu). To address their water-related problems, both Mysore and Madras planned various projects on the Cauvery. However, none of the projects were completed. Consequently, both faced famine and drought problems at regular intervals. To address the issue, in 1892, an agreement was signed between Mysore and Madras. Following the 1892 agreement, the King of Mysore, Krishnaraja Wodeyar, planned to build a dam at Kannamabadi village to hold 41.5 thousand million cubic feet of Cauvery water. This was opposed by Madras, which planned to build a dam at Mettur with a water storage capacity of 80 thousand million cubic feet. In 1914 the British Government intervened the issue and finally another agreement was signed in 1924, with a validity of 50 years. However, as in 1974 the agreement stands lapsed, conflicts came out again among the Karnataka and Tamilnadu states of independent India. Under legal provisions of the constitution of India several cases have been dealt with and a lots of verdicts have been passed since then, among which the latest was from the Hon'bl Supreme Court of India in the year 2018.

Actually, post 1974, it was found that the state of Tamil Nadu had already built up the command area on the basis of designed water availability as per 1924 agreement and the full potential was being utilised. Consequently, it was not possible for the state to accept any major cut in water availability (in order to save their agricultural sector), while Karnataka was to initiate the development of irrigation network and was running short of opportunity with considerably lower share of Cauvery water compared to TN. Following the dispute in 1990 the Supreme Court of India ordered formation of tribunal to take care of the conflict, before which all the disputing states put their demands forward. While, Karnataka emphasised that Tamil Nadu is having more water resources in form of both South –West and

North-East monsoon, higher groundwater potential at its deltaic region, and that the Karnataka is having 50% more drought prone area than TN, on the other hand Tamilnadu showed that their average annual utilisation of water is higher than yield and there is not surplus of water for saving. Other two states Kerala and Puducherry also put their demands for an equitable share of the water. The Cauvery Water Dispute Tribunal (CWDT) continued their fact finding and finally come up with recommendations in 2007. In its order, the Supreme Court had calculated the total availability of water at 740 thousand million cubic feet (measured at Lower Coleroon Anicut site), at 50 per cent dependability. The CWDT allocated 30 thousand million cubic feet to Kerala, 270 thousand million cubic feet to Karnataka, 419 thousand million cubic feet to Tamil Nadu and 7 thousand million cubic feet to Puducherry, while 10 thousand million cubic feet was set aside for environmental protection, and four thousand million cubic feet written off as inevitable escapages into the sea.

Dissatisfied with the verdict, the disputing parties further plead for a Special Leave petition which was accepted by the Supreme Court and finally, the latest verdict came in the month of January, 2018. In this verdict, considering the infrastructural needs of Bengaluru city of Karnataka, the SC ruled for release of 177.25 Thousand Million Cubic feet water to Tamil Nadu as opposed the 2007 recommendation of 192 (TMC) .

Finally, taking into account all the above-mentioned aspects, the Supreme Court has allocated 284.75 (270 plus 14.75) thousand million cubic feet to Karnataka, 404.25 (419 minus 14.75) thousand million cubic feet to Tamil Nadu, 30 thousand million cubic feet to Kerala, 7 thousand million cubic feet to Puducherry and 10 thousand million cubic feet for environmental protection while 4 thousand million cubic feet was written off as inevitable escapages into the sea.

#### **Adopted from:**

Rajan, A. 2018. Cauvery River Water Dispute in India. *ISAS – Working Paper, No. 293*. National University of Singapur. April, 2018.

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