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Bengaluru, Chennai, Delhi

Water crisis looms over India's Silicon Valley: What happened and what's next

How bad is the water crisis in India?

By Prarthana Mitra

Whitefield, Bengaluru, is already facing a water crisis that will worsen as rising population continues to exert pressure on the receding groundwater table. Credit: Wikimedia Commons

After Chennai, another major city in the south, Bengaluru, is likely to be hit by a severe water crisis. Experts have warned that the Karnataka capital, often touted as the Silicon Valley of India, will soon be uninhabitable as the swelling population continues to put pressure on its water table.

BWSSB Chairman, Tushar Girinath told *The New Sunday Express* that levels of water in the reservoirs is alarmingly low and the impact is already being felt in newly-developed areas and the IT corridors.

According to a study by the Indian Institute of Science (IISc), the key affected areas include HSR Layout, Whitefield and Bellandur. Residents in Tavarekere have complained of getting tap

water for only half a day, which is an improvement from only half-an-hour a day in the summer months.

While main reason is the below average monsoons in Karnataka, which has so far registered a 30 percent rain deficit this year so far, there are a number of artificial reasons for the same, and few changes that could have helped avert this.

Lessons from Chennai

As the Tamil Nadu capital continues to reel from the lack of clean drinking water and the increasing privatisation of a public good, the prospect of an acute shortage of water in Bengaluru has put corporations, industries and residents in the district on tenterhooks.

For example, the cement sector is already preparing for the dampening effect of delayed monsoons.

Chennai, in the meantime, awaits rainfall as schools, offices and even hospitals have shut or scaled down operations to conserve water, or for the lack of it. *Orius* noted in an earlier report how six of Chennai's most vital freshwater aquifers have run dry this summer, the major brunt of which is being borne by settlements on the fringes.

With little or no rainfall this monsoon season, the neighbouring state too is looking to boost the official distribution network across the capital. The Bengaluru Water Supply and Sewerage Board (BWSSB) is faced with the daunting task of providing water to a city with an increasing population.

How did the crisis assume form?

According to a recent report by the *Economic Times*, India's water end up everywhere but India, because we happen to be the world's biggest water exporter. Putting so much water into rice grains and swelling cotton bolls seems a criminal waste of a precious resource, the report says.

There are other implications too. Very little water received as rain actually enters the groundwater table. A key reason for that is the lack of public infrastructure and individual endeavours to conserve surface runoff. Misallocation and mispricing are equally to blame.

Besides, we have also largely failed to prevent industrial effluents and sewage from entering freshwater lakes and rivers, and condoned the indiscriminate digging of borewells to compensate for rising urban pressure on land.

Every day 1450 mld water is supplied to Bengaluru city, 70 percent of which is from the KRS catchment area, dried by peak summer and no rainfall, while the rest is from Kabini (which also fluctuates depending on water upstream).

There are also 10,000 borewells used by people to draw water, of which 1,000 are defunct.

Bengaluru has a thriving urban ecosystem to support

The latter may especially be true in Bengaluru's case where population growth has put a strain on the city's natural resources and led to the depletion of lakes and wells. The city, as predicted, is paying the price for years of rapid urbanisation.

The revised master plan for the city, published by the Bengaluru Development Authority (BDA), has predicted that city's population will increase by approximately 8 million and reach 20.3 million between 2019 and 2031.

Poor water management and inefficient city planning has further led to drying taps and falling groundwater levels, increasing the dependence on borewells and water tankers. Private vendors are capitalising on this crisis

News18 spoke to activists working towards highlighting the impending emergency, who reported that water is being auctioned to highest bidders in some areas of the city. Borewells have already reached depths of 1,500 feet and below, they said.

Explained: How and why scientists are mapping groundwater

According to a report in *The Hindu*, Ramesh Reddy, a private water supplier for over two decades in southeast Bengaluru, said that demand for water had almost doubled over the last one month as borewells were drying up.

Water riot or water security?

If there is no adequate rainfall by July end, the BWSSB will start rationing water supply to the city. Officials are also contemplating drawing water from Sharavathi and Linganamikki, a project that will leave rural hinterlands dry and thirsty at the cost of easing urban droughts.

The unfolding situation in Bengaluru thus demands laws that incentivise reviving of local water resources, and penalises the use of imported water. That may avert water wars wrought by tanker businesses. Carbon fines should also be imposed on water that needs to travel.

Subsidies must be completely removed from water from the Cauvery, and provided to every ward that ensures that local lakes are kept clean and maintained, and local wells are recharged. Empowering the local communities, that once planted trees and built lakes to trap rainwater, is the only way forward.

The Karnataka state government is also thinking of banning new apartment constructions for the next five years, until the water crises in the City improved. In fact, all industrial operations – private or public – that require huge amounts of water must be scaled down until the coast is clear.

Why it matters

The connection between India's population and its water sources is deeply personal and bound by religious-historical lines. But the country's much-discussed water scarcity has turned its rivers and lakes into political tools domestically as well as weapons in international relations.

Water riots have begun in Bundelkhand, Uttar Pradesh, while agricultural belts across Gujarat, Madhya Pradesh and Maharashtra have been dealing with some of the most acute perennial drought spells in history.

As India's water crisis has begun to make headlines across the world, a recent survey by the Indian Institute of Human Settlements shows how rapidly the per capita groundwater availability is declining. According to it, in 1951, it was 14,180 litres a day, by 2001 it reduced to 5,120 litres, and is expected to come down to 3,670 by 2025.

Over half of the wells in India are seeing a fall in water levels and a total of 21 major cities are estimated to run out of groundwater by 2020, concluded a landmark report last month.

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