

## Cleaner Mithi gives plush BKC a facelift

## **Mithi River**

The level of pollutants in a three-km stretch of the usually filthy, putrid and much abused Mithi river has dropped by as much as 90-95 per cent owing to a path breaking microbial technology used by the city's development authority. According to laboratory results, there has also been a drastic reduction in the level of ammonia, which was responsible for giving the river its foul smell.

In a pilot project aimed at purifying the Mithi stretch that runs alongside the plush Bandra-Kurla Complex, the Mumbai Metropolitan Region Development Authority (MMRDA) has used a technology called bioremediation. The US-based technology uses Persnickety® 713, a biochemical developed by Syneco Systems, to convert the anaerobic elements in the water body to aerobic elements and enables sunlight to act as a natural disinfectant.

Locally, the MMRDA has a contract with Delhi-based JM Enviro Technologies Pvt Ltd to provide the technology for three years at a cost of Rs 6 crore.

The technology has been in use since last October at three points — Teachers' Colony at Santacruz, Standard Chartered office at BKC and the MTNL bridge. In December, the application was extended to the river under the Tata Colony Bridge and Dharavi Bridge.

"The results have been very positive. This technology can be implemented on a larger scale. We will collect data for one year and talk to the Brihanmumbai Municipal Corporation to implement the technology in its jurisdiction of the Mithi river," said Shridhar Aralikar, superintending engineer, MMRDA.

The 18-km-long Mithi, of which six km fall under MMRDA's jurisdiction and the rest under the BMC, is the suburbs' main natural water drain and accommodates untreated waste from 43 side drains.

If the level of chemical oxygen demand (COD) and biochemical oxygen demand (BOD) in the water is high, the water is described as sewage, as was the case with Mithi. Laboratory readings obtained by the MMRDA show that the COD and BOD levels were as high as 1,015 mg/litre and 405 mg/litre respectively before using the technology. The permissible limits as prescribed by the Maharashtra Pollution Control Board are 100-150 mg/litre for COD and less than 50 mg/litre for BOD. Post-bioremediation, by June, the levels dropped to as low as COD of 42 mg/litre and BOD of 15 mg/litre, much under the permissible limits. The level of ammonia has also reduced by 68.4 per cent from November to June.

"No flora and fauna can thrive with such high levels of BOD and COD. When we had started, there were a few fish in the river and they were all black. Now, we can see some algae growing on the surface. The odor has nearly gone," said Manoj Pal, the country business head at JM Enviro.