Pangong Lake – Surreal Beauty

Pangong Lake – the highest saltwater lake in the world – is situated in Ladakh. The lake mesmerises one and all with its shimmering beauty. But with tourist inflow increasing over the years, how long will this region be able to preserve its exquisite beauty?
The first look of this high-altitude lake strikes you as something out of this world. (In fact, there is a board specifying the exact spot from where you could get the first glimpse of this unique water body.) You forget the five-hour, 140 km long journey from Leh over some of the most terrifying, torturous, bumpy and bone-shaking terrain, and cannot help being mesmerised by the Pangong Tso – one of the most beautiful lakes in Ladakh, and perhaps the world.

It is only when you get closer to the shores of the lake that the real beauty of the sparklingly blue water and the barren mountains in the background really hit you. Every where you look the scenery seems to be straight out of a painting. Just click and you would have captured an exquisite piece of this truly exotic panorama in your camera. Even in the summer of June the breeze is strong and icy cold...the transparent and crystal clear water colder still.

Spend sometime at the lake and you find the lake changes colour from all shades of blue to green and even white. Actually, Pangong lake is the highest saline lake in the world situated at an altitude of 4,350 metres (14,270 ft). The air is thin here. Besides, it is very deep and there is no atmospheric pollution, the kind that we see in cities, to block out the sun's rays. It is due to this interplay of factors that the lake water appears to look so blue and the colour keeps changing with the intensity and angle of the sun's rays.

Tourist influx, as seen from the tented camp along the shore, has started impacting one of the most beautiful lakes in the world.

The Pangong Tso (Pangong meaning “extensive concavity” and “Tso” in Ladakhi meaning “Lake”) gained popularity when it was featured in the last scene of the immensely popular 2009 movie, “3 Idiots”. Situated in the Himalayas near the Chushul Mountains across Changla Pass, the Pangong Lake is 144 km long with its widest expanse being around six kilometres. While 40% of the lake falls in India, the rest belongs to China, extending into Tibet where it is known as the Banggong Co (Tibetan for “long, narrow, enchanted lake”). The Pangong Lake is said to be an endorheic lake. An endorheic basin is essentially a closed drainage basin that retains water with no outlet in to rivers and oceans. Normally, water from drainage basins flows out through rivers or streams or permeates through rocks,
ultimately ending up in the oceans. But in an endorheic basin, water collecting in the basin from precipitation does not flow out but only evaporates. Of course, the region receives scanty rainfall because the monsoon winds dry up when they move along Western Himalayan ranges towards the North. Pangong gets most of its water from the high snowcapped mountains and glaciers. Despite the high salt content of the lake, in winter its surface freezes completely. This is a very uncommon phenomenon but occurs since the temperatures are too low to avoid the freezing of water. In winters, animals can be seen walking over the ice sheets.

There are no fish, except for some small crustaceans, and very few micro-vegetation in the lake due to the high salinity and also the fact it remains frozen during the winters. The inorganic nitrogen in the lake has also been recorded at very low concentrations. Fishes have been recorded only from the inlet stream of the lake and were absent from the main lake. According to researchers, it is possible that in the past the fishes might have been present in the lake but over a geological period of time as the salinity of the lake increased due to evaporation, they might have ventured into the inlet stream. There are also some species of scrubs and perennial herbs that grow in the marshes around the lake.

The lake is an important breeding ground for a variety of birds including a number of Seagulls and Ducks. Pangong Lake is host to a number of Seagulls and Ducks.

**World’s Largest Solar Telescope**

Pangong Lake, the world’s highest saltwater lake, will soon notch up yet another record. Merak at the Pangong Lake has been chosen as the site for setting up the world’s largest solar telescope. The National Large Solar Telescope (NLST), fitted with a 2-meter reflector, will help scientists in carrying out cutting edge research to understand the fundamental processes taking place on the sun. It will also help the scientific community to study the long-term changes in the earth’s climate and environment and also provide useful data to carry out research in order to minimize or remove disruptions to communications network and satellites due to periodic solar winds.

The site was selected after studies showing that Pangong Tso lake site at Merak was “very promising and offered longer sunshine hours”. The National Large Solar Telescope (NLST) project involves the Indian Institute of Astrophysics (IIA), Indian Space Research Organisation (ISRO), Aryabhatta Research Institute of Observational Sciences, Tata Institute of Fundamental Research (TIFR) and Inter-University Centre for Astronomy and Astrophysics (IUCAA). The project involves an investment of over Rs 250 crore.

Once installed, the telescope will take over the number one status from the McMath-Pierce Solar Telescope, which has a diameter of 1.6 meters in Kitt Peak National Observatory at Arizona in the US, as the biggest telescope.
migratory birds. You can see numerous ducks and gulls. The Bar-headed goose and Brahmini ducks are commonly seen here.

Pangong Tso is in the process of being designated under the Ramsar Convention as a wetland of international importance, the first such trans-boundary wetland in South Asia. There are also plans to create a high-altitude wildlife sanctuary, which will include the lake.

Ever since it was thrown open to tourist traffic a few years ago, the region’s popularity has skyrocketed riding on its appealing beauty. But this has put increasing pressure on its eco-system. Increasing visitor inflows have exacerbated waste problems. The absence of garbage disposal facilities has led to dumping of garbage in streams and even in burrows that house marmots, mouse hares or voles. The increasing tourist disturbance is also impacting bird-nesting areas, thus threatening the biodiversity of the birdlife. Tourists also often clean out the sparse mountain vegetation for campfires.

The Government of India has notified the Wetlands (Conservation and Management) Rules 2010, which especially bring under their purview high altitude wetlands, along with the Ramsar Wetlands of International Importance. The rules prohibit activities such as reclamation, setting up of new industries and expansion of existing industries, dumping of solid waste and any other activity likely to have an adverse impact on the ecosystem of the wetland.

But, rules and regulations apart, isn’t it the responsibility of each one of us who visits such regions to preserve their tranquility and sereneness? John Keats said, “A thing of beauty is a joy forever…” One hopes, the Pangong Lake remains a source of joy for all who visit it – for all times to come.