

City should expand use of treated waste water for irrigation and lavatories

By **Nelson Moura** - March 30, 2019



Macau (MNA) – The President of local engineering consultancy company PAL Asia Consultants, Rui Cernadas, told MNA that the city should increase the re-use of treated residual waters for flushing systems and irrigation as a way to reduce potable water usage.

“Daily water use in toilet flushing or all sorts of irrigation for gardens or golf courses accounts for about 38 per cent of potable water use worldwide. Why is potable water used for these purposes? It’s something that needs to be re-thought,” he added.

Mr. Cernadas – who is also part of the Macau branch of Portuguese water treatment group ECOserviços – was one of the speakers at the 2019 Macao International Environmental Cooperation Forum (MIECF).

“It’s not that complicated to conduct a more adequate treatment of these residual waters and equip buildings with network systems, specifically to supply re-used treated water to housing units’ toilets or gardens. It’s a topic that needs to be discussed not just in Macau but worldwide,” he added.



The Macau Housing Bureau (IH) has previously developed an experimental re-used treated waste water supply in some of the 19,000 units of the Seac Pai Van public housing complex, completed in 2013.

When asked if the current water treatment facilities in Macau were able to deal with the daily volume of waste water generated in the city, Mr. Cernadas indicated that “there is room for improvement”.

“We can’t forget that we have about 600,000 residents but about 35 million visitors per year. We can’t think waste water is only being generated by local residents [...] That’s why having more adequate treatment plants for water and solid waste is needed. I think the government is tackling this issue but there is room to improve,” Mr. Cernadas stated.

Waste water generated in Macau is treated in three treatment facilities in Ilha verde, at the Outer Harbour reservoir and in Coloane, with a fourth facility being built in Seac Pai Van expected to be operational this year.

After its opening, Macau’s total daily water supply is expected to increase from the current 390,000 to 520,000 cubic meters.

On Thursday, one of the founders of MIECF, António Trindade, stated that every year a **large amount of raw sewage** is discharged onto local waters with the permission of authorities.

In May, 2018 TDM Radio reported that four reports indicated that the water treatment capacity of the facility in Macau was lower than indicated by the Environmental Protection Bureau (DSPA) and that since 2009, about half of the volume of sewage received was discharged into the sea without due treatment.

