

MEDIA RELEASE

New efficiency standards to drive water conservation in non-domestic sector Commercial water equipment and water closet flush valves must meet minimum water

Commercial water equipment and water closet flush valves must meet minimum water efficiency requirement from January 2022

Singapore, **4 March 2021** – From 1 January 2022, commercial water equipment and water closet (WC) flush valves that are supplied and sold in Singapore will need to meet minimum water efficiency requirements. This is part of ongoing efforts by PUB, Singapore's National Water Agency, to drive greater water efficiency in the non-domestic sector.

- PUB's new minimum water efficiency requirements apply to WC flush valves (≤4.0L per flush, equivalent to a minimum 2-tick rating under the Mandatory Water Efficiency Labelling Scheme (MWELS)¹), commercial dishwashers (≤2.4L/rack), washer extractors (≤8.0L/kg) and high pressure washers (≤11.0L/min). This will gradually phase out the use of less water-efficient water fittings and commercial equipment, and motivate suppliers to introduce more water-efficient models into the market.
- 3 Singapore currently consumes about 430 million gallons of water per day, with the non-domestic sector accounting for more than half of the demand. By 2060, national water demand is expected to almost double with non-domestic demand accounting for the majority of the demand then. It is therefore imperative that businesses continually step up their efforts to use water wisely and make every drop count.
- If all businesses switch to commercial equipment and WC flush valves that meet the minimum requirement, Singapore will be able to achieve approximately 1.2 million cubic metres (m³) of water savings in total annually, equivalent to the volume of about 480 Olympic-sized swimming pools.

High availability and affordability of water efficient commercial equipment and WC flush valves

Commercial dishwashers, washer extractors and high pressure washers are commonly used by large water users such as hotels, hospitals, F&B outlets, laundromats and cleaning companies, which consume a significant amount of water daily. WC flush valves are typically used in toilets with high usage frequency, such as public toilets in schools, shopping malls and hawker centres, and require regular maintenance. By switching to more water efficient equipment and WC flush valves, such businesses can reduce their

¹ The MWELS was introduced in 2009 to help consumers make informed purchasing decisions by denoting the water efficiency level of water fittings and domestic appliances through a 0/1/2/3/4 tick rating system. MWELS will be extended to cover WC flush valves from 1 January 2022.

annual water consumption and save on their utility bills (see annex A for estimated water savings achieved).

- Based on market research, more than 70% of commercial dishwashers, washer extractors and high pressure washer models available in the market today already meet the minimum water efficiency requirements, and most of these models generally cost less than the less water-efficient models.
- By end 2021, there will also be a sizeable pool of WC flush valve models (around 30%) that are more water-efficient (i.e. 2-tick and above). On average, 2-tick rated WC flush valves are 30% cheaper than the less water efficient models. The average costs of 2-tick and 3-tick rated WC flush valves are about \$460 and \$480 per unit respectively, while the average cost of 1-tick rated WC flush valves is about \$700 per unit. PUB will continue to work closely with the industry to encourage manufacturers and suppliers to introduce more water-efficient models in the market.
- 8 "Managing water demand is critical for Singapore's long-term water sustainability and we continuously look into ways to improve water efficiency in the non-domestic sector. PUB has consulted the industry extensively on these mandatory requirements and ascertained that they have minimal impact in terms of compliance costs but are expected to yield substantial water and ultimately cost savings for businesses.
- "Businesses can choose to purchase or switch to more water-efficient models to reap these benefits immediately or do so when they want to replace their existing equipment. Water is precious and all of us must do our part to conserve water," said Mr Ridzuan Ismail, Director of PUB's Water Supply (Network) Department.
- To facilitate early adoption of water-efficient equipment, businesses with monthly water consumption of at least 1,000m³ can apply for PUB's Water Efficiency Fund (WEF) to purchase water-efficient equipment, and receive funding of up to \$300,000 or up to 50% of the installation cost from now till December 2021. The WEF was recently enhanced in November 2020 to provide funding support for water efficient equipment.

Annex A: Minimum water efficiency requirements for commercial equipment & WC flush valves

Annex B: Infographic – Businesses save more with new water efficiency requirements

ANNEX A

Minimum water efficiency requirements for commercial equipment and water closet flush valves

| Type of commercial equipment / water fitting | Major non-domestic users | Current water consumption range available** | Minimum water efficiency requirement from 1 Jan 2022 | Estimated annual water savings achieved^ |
|---|---|---|---|---|
| Dishwasher (undercounter and hood type only) | Café and coffee houses, F&B outlets, hospitals, hotels, restaurants | 1.0L/rack to 3.4L/rack | ≤2.4L/rack | ~6% |
| Washer extractor (front and top load only) | Dormitories, hospitals, hotels, laundry companies, prisons, schools | 3.9L/kg to 15.6L/kg | ≤8.0L/kg | ~5% |
| High pressure washer (for general cleaning of common areas)* | Cleaning companies (engaged by Town Councils, condominiums, etc) | 6.0L/min to 15.5L/min | ≤11.0L/min | ~4% |
| Water closet flush valve | Public toilets in shopping malls, MRT stations, hawker centres, etc, and some non-domestic premises (e.g. schools, offices, commercial buildings) | ≤3.5L per flush to 4.5L per flush | <pre>≤4.0L per flush (i.e. minimum 2-tick rating)</pre> | ~15% |

^{*}The water efficiency requirements apply only to high pressure washers used for general cleaning of common areas of premises such as common areas of HDBs, condominiums, commercial buildings etc. It excludes those used for specialised cleaning and at industrial premises for specialised work.

ANNEX B

Infographic: Businesses save more with new water efficiency requirements

^{**}Based on the list of existing models of commercial equipment and WC flush valves in Singapore.

[^]Based on the comparison with average water consumption of existing models which do not meet the water efficiency requirements in Singapore.





WITH NEW WATER **EFFICIENCY REQUIREMENTS**

From 1 January 2022, Water Closet (WC) flush valves and commercial water equipment that are supplied and sold in Singapore will need to meet minimum water efficiency requirements. Your business can enjoy cost and water savings by switching to more water-efficient models.



1. Higher standards for WC flush valves



WC flush valves sold must have a minimum 2-tick label (≤4.0L per flush). They are now covered under the Mandatory Water Efficiency Labelling Scheme (MWELS), which rates a product for its water efficiency. Learn more at www.pub.gov.sg/wels



2. More water-efficient models

There are now minimum water efficiency requirements for commercial dishwashers (≤2.4L/rack), washer extractors (≤8.0L/kg), and high-pressure washers (≤11.0L/min). Less water-efficient models will be phased out gradually.

WHY IT BENEFITS YOUR BUSINESS



Save water and shrink your bills

By using more water-efficient equipment, your



Save on equipment cost

On average, a 2-tick WC flush valve is about

There is no need to replace your existing equipment/WC flush valves immediately. You can choose to do so only when it is needed.

HOW MUCH WATER SAVINGS CAN YOU ENJOY?

Here's a look at the potential amount of water savings you can enjoy each year by switching to more water-efficient models.

H Type of water equipment/fitting Dishwashers (undercounter and hood type only) (front and top load only) Estimated annual 6% 15% water savings

Find out more about the new requirements at go.gov.sg/new-water-efficiency-requirements









