



The Secretary of the Committee
House Standing Committee on Environment and Heritage
House of Representatives
Parliament House
Canberra ACT 2601

Submission No:	14
Date Received:	17/8/07
Secretary:	<i>[Signature]</i>

17 August 2007

Dear Secretary

Subject: Inquiry Into the Regulation of Plumbing Product Quality in Australia

Thank you for the opportunity to make a submission to your Inquiry. Rheem has operated in Australia for over 60 years and our water heaters can be found in approximately 1 in 2 Australian homes. We have a strong commitment to the Australian plumbing industry as evidenced by our substantial leadership of and participation in the regulatory and standards committees relating to water heaters and plumbing generally.

With specific regard to Committee's terms of reference, Rheem would like to make two recommendations that we believe should be included in your deliberations:

1. The plumbing industry requires a **strong and consistent regulatory environment**, with an appropriate level of **audit and enforcement**. This will drive industry efficiency as well as give surety to manufacturers that the investments they make to ensure compliance with local regulations have some level of **protection against illegal imports** and backyard operators.
2. Australia's water crisis requires that a **uniform national regulation on the water usage performance of water heaters be implemented**, to supplement the energy performance regulations currently in place. This initiative could **save approximately 5% of internal domestic water usage**.



We have detailed the reasons behind these issues on the attached pages.

As the leading water heater supplier in Australia offering the widest range of water heater types, including instantaneous, we believe we have a unique ability to take a relatively objective view of the Australian plumbing industry. I look forward to being able to discuss these matters further with your committee, and am happy for either myself or my staff to be involved in any public hearings that your committee schedules.

Yours sincerely

A handwritten signature in black ink, appearing to read 'M. Sexton', written in a cursive style.

MATT SEXTON
CHIEF EXECUTIVE OFFICER

Recommendation 1

THE PLUMBING INDUSTRY REQUIRES A STRONG AND CONSISTENT REGULATORY ENVIRONMENT, WITH AN APPROPRIATE LEVEL OF AUDIT AND ENFORCEMENT.

The Plumbing Code of Australia (PCA) is a national code that is managed by the National Plumbing Regulators Forum. This forum consists of nominees from each Australian State and Territory, together with industry representatives and representatives of the standards bodies.

As part of the PCA, there is a schedule of products that require “Watermark”, which is an indication that the product has undergone a series of independently verified tests to prove that it complies with a particular standard. The PCA also specifies the standard for different appliances.

Each State in turn has their own plumbing code which, in some instances, calls up the PCA. Interpretation of the code, including enforcement, is managed at a State level.

It is Rheem’s experience that this system works well in most instances, except where interpretation of the PCA differs between jurisdictions. Rheem recently encountered problems with a new product that, although it had achieved Watermark, was not considered by one State’s local plumbing inspectors to comply with other elements of the PCA and the State regulation. Rheem was forced to manage a large group of unhappy builders who were unable to hand over properties to their customers until after the water heater was passed by the local inspectors. This situation took over 2 months to resolve, with the heaters eventually being passed, being deemed to comply due to their Watermark.

More worrying is the lack of an adequate enforcement regime for both product and installation quality. Despite the introduction of the WaterMark scheme in 2005, non compliant products remain readily available. Regarding installations, The Plumbing Industry Commission (PIC) of Victoria recently announced that up to 40% of solar installations that they audit fail to comply with the local regulations. Whilst it is important that the PIC is identifying these issues, they are only capable of auditing 5% of new home installations.

The recent increased stringency of MEPS for electric water heaters (2006) and the proposed MEPS for gas water heaters (2008) have and will in the future add considerably to Rheem's R&D and ongoing manufacturing costs. Unless an enforcement regime is put in place to ensure that all products sold on the Australian market comply with these new higher standards, Rheem believes that we and other local manufacturers will be placed at a serious competitive disadvantage, particularly against unscrupulous importers, backyard manufacturers and water heater reconditioners.

SOLUTION : It is Rheem's recommendation that the current Watermark scheme continue to be used as the method by which standardisation of product quality is controlled, however with an increase in the level of audit to ensure compliance and an increase in the enforcement of the code.

Recommendation 2

AUSTRALIA'S WATER CRISIS REQUIRES THAT A **UNIFORM NATIONAL REGULATION ON THE WATER USAGE PERFORMANCE OF WATER HEATERS BE IMPLEMENTED.**

The current Australian Greenhouse Office initiative to impose a higher Mandatory Energy Performance Standard (MEPS) on gas water heaters will limit the sale of gas water heaters to those reaching a "5 star" rating or above. This change, whilst important in reducing greenhouse gases, will result in a large increase in the uptake of imported instantaneous water heaters. This in turn will result in a huge increase in the wastage of water which must surely be both unintended and unacceptable.

From the AGO website we know that a storage water heater, when supplying the load specified in AS 4552, will only waste approximately 3 litres per day through the expansion relief valve. We also know from measurement of the performance of a range of 5 Star instantaneous water heaters that they will conservatively waste more than 20 litres per day per unit when operated in accordance with the load profile specified in AS4552 at a controlled flow level. At maximum tap flow rates this number can increase up to 42 litres per day per unit and even higher for mechanical instantaneous water heaters.

Based on current market shares within the 5 star gas water heater market, it can be safely assumed that 75% of the gas water heater market will convert to imported instantaneous water heaters. This, coupled with an average 20.7 litres per day wastage rate per unit will result in water wastage per year of **1.7 billion** litres. Cumulatively over 5 years, the total amount of water wasted would be in the range of 20 – 25 billion litres, or about 5% of domestic internal water usage.

The water wastage will be compounded even further as State regulators also drive to ban electric water heaters and force an even greater take up of gas. Currently sales of electric water heater units represent one half of the total market.

Water efficiency and energy efficiency in water heaters are inextricably linked. The issue of water wastage is as important as greenhouse gas emissions for the Australian community, and as such should be regulated as tightly as energy usage.

SOLUTION : It is therefore Rheem's recommendation that a maximum water wastage (to be measured using an agreed standard methodology), be introduced into the plumbing regulations for hot water systems and further, that water saving devices be enforced in homes when an instantaneous gas water heater is to be installed. The deemed water efficiency of an instantaneous water heater should be no worse than that of a storage water heater.

ABOUT RHEEM

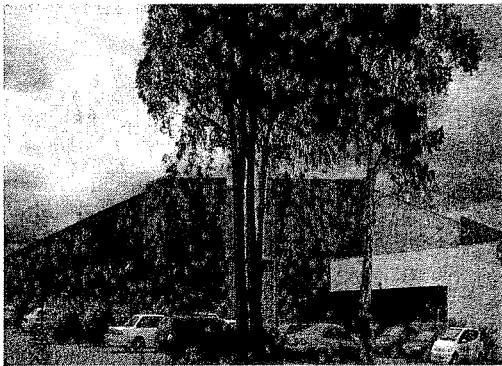
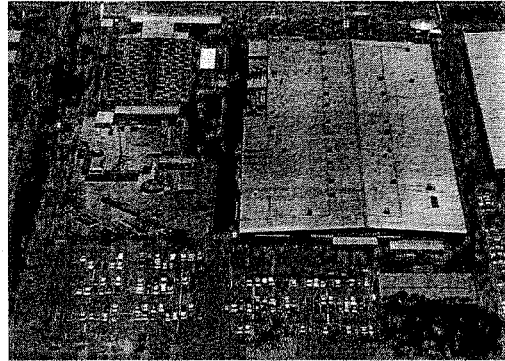
Rheem employs nearly 1000 people in Australia.

Rheem has three large manufacturing sites throughout the country:



Rheem Rydalmere NSW
Gas, Electric and Solar
Water Heater Manufacture

Rheem Welshpool WA
Gas & Electric Boosted Solar
Water Heater Manufacture



Rheem Scoresby Vic
Gas Water Heater
Manufacture