## Vulcan Anti-Scale Reference Studies



## **Installation Details**

Model	Vulcan S25
Location	Ibis Budget - Makassar Airport
	Sultan Hasanuddin Int'l Airport
	Maros, Sulawesi Selatan 90552
	Indonesia
Install Area	Guest Rooms - Bathroom Water
	Heating Elements



Picture 1. Ibis Budget Makassar Airport



Several rooms were monitored before Vulcan was installed and had large amounts of scale chunks on the heating element and at the reservoir sump (**see pictures 2 & 3**). Vulcan was installed at the main incoming water line to eliminate this problem (**see picture 4** 



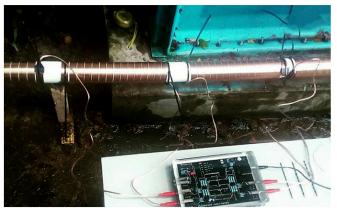
Pictures 2 & 3. Scale previously coating the heating element and reservoir sump. (Picture taken from one of the rooms at IBMA hotel)

## "After" Vulcan Installation

Scale gradually disappeared from the elements and reservoir sump. After 3 months scale is entirely gone from water heater elements and the reservoir sump.



Pictures 5 & 6. 3 weeks after Vulcan installation, initial scale has been eliminated.



Picture 4. Vulcan installation process at the main incoming water line.

Vulcan has shown to successfully reduce time, energy and capital required by the hotel for water system maintenance. All pictures were taken from one out of ten rooms that were monitored before and after Vulcan was installed, and all rooms' water heater elements were also found to be free of scale.



Pictures 7 & 8. 12 weeks after Vulcan installation, no scale at all.