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14 March, 2012

Mr Bryce Christian, Aquatherm, PO Box 2038 Rockdale Sydney NSW 2216

Re: Failure of Aquatherm Pipe Systems

Dear Bryce,

I have investigated a number of failures of Aquatherm pipe systems. Several common themes have emerged from these investigations. The failures are brittle in nature and have usually occurred as a result of degradation of the PP-R as a result of the presence of copper. In numerous cases, the degradation has been accelerated due to stresses induced in the pipe system as a result of thermal expansion and/or incorrect installation that induces higher levels of stress in the system. High temperatures, high local stresses and the presence of oxidizing agents such as copper can cause failures at shorter than expected service lifetimes.

Yours sincerely

A/Prof Rowan W. Truss,

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