

21st April, 1989

Mr R. Jones
Ralph Jones & Associates Pty Ltd
62 The Boulevard
Chadstone 3148

Dear Ralph,

1989 Water Tower Report

Further to my letter dated 15th December, 1988, I wish to update my report to you re. the interior of the sphere.

The water was drained on 20th March and cleaned over three days. I made an internal inspection to determine the condition of:-

1. The Anodes
 2. Surface Area
 3. Outlet Pipe
-
1. Up to three of the anodes are coming to the end of their life and will possibly require replacing within 2 - 3 years. The remainder will last considerably longer. I have inspected the inner tank anodes to check their condition. They appear in as new condition, which seems to point out that perhaps they were not required. If this is the case, it might be prudent to exchange these with the worn ones in the outer tank.

Bob Birch is concerned about the cost of each anode (\$1,600 @ 28th August, 1986), and suggested we investigate other possible avenues.
 2. The interior surface is in excellent order apart from some paint bubbles which have since had attention. In most cases the steel body under the bubbles appear to be unaffected, apart from odd ones which had minor surface rust.

FLETCHER JONES

Fletcher Jones & Staff Pty. Ltd. (Incorporated in Victoria)
Executive Offices, Pleasant Hill, Warrnambool,
Victoria 3280, Australia.
Telephone (055) 62 4011 Fax (055) 64 8310

3. The interior of the outlet bend is very badly corroded with some quite deep pitting. The last paint treatment surrounding the opening is in very good order so the problem area is confined to the bend.

There are several ways to attack the problem :-

- a) Install a Zine Anode in the centre of the bend (see drawing), and subsequent equipment. I am not sure if we are too late to stop further corrosion at this point of time.
- b) Install a new bend with cathodic protection.
- c) Install above but have a flanged joint; bend to pipe (may require a flexible coupling).

Note : Any work outside the ball would require contractors as we do not have the necessary rigging equipment.

Lou Gersch is not sure what affect a Zine anode would have on the magnesium anodes, but suggests the exercise may be well worth the effort.

Exterior :

After paint treatment of the cage area, it is apparent that this area will require extensive works to restore it to a satisfactory standard. Consideration may even need to be given to replacing the cage in the not too distant future as the corrosion is extensive. It is rusting under the paintwork badly before showing up to the naked eye.

The orange paintwork on the legs is fading and rust, from the cage in particular, is staining this paintwork. Consideration will need to be given to this area in the near future.

In summary : some anodes will require replacing
 the outlet pipe requires attention
 the cage requires attention
 the legs will require painting

FLETCHER JONES

Fletcher Jones & Staff Pty. Ltd. (Incorporated in Victoria)
Executive Offices, Pleasant Hill, Warrnambool,
Victoria 3280, Australia.
Telephone (055) 62 4011 Fax (055) 64 8310

I have taken several photographs of the interior to retain for future reference. They may be particularly useful in determining the rate of corrosion for ascertaining future replacement.

Please do not hesitate to advise or enquire further regarding this report.

Best regards,

John Woolf
Maintenance Manager

CC : Bob Birch .

JW:TNM

FLETCHER JONES

Fletcher Jones & Staff Pty. Ltd. (Incorporated in Victoria)
Executive Offices, Pleasant Hill, Warrnambool,
Victoria 3280, Australia.
Telephone (055) 62 4011 Fax (055) 64 8310