



Completion Report



Buckingham Palace

Westminster
London
SW1A 1AA



Project Brief

Echo Square Service Ltd were asked to provide a solution to reline a sectional GRP cold water storage tanks which had started to leak.

We proposed that the existing coating be removed, and the tank then given long term protection by the application of a solvent free polyurethane coating.

The product employed was a solvent free **DRINKING WATER POLYURETHANE (ES 988 DWPU)**, which offers numerous economic, technical and environmental features and benefits, some of which are highlighted below:

- WRAS Approved
- Complete Solvent Free Technology
- High degree of flexibility @ > 35%, capable of accommodating structural movement compared with resin / epoxy / bitumastic coatings of <1.0%
- Superb adhesion to steel, concrete, GRP and many other substrates.
- High levels of impact and chemical resistance.
- Long life performance with minimal maintenance
- Easy clean, ceramic tile-like finish
- Excellent track record for applications such as drinking water tanks, cooling towers, reservoirs etc.

The following pages show the methodology employed.

Methodology

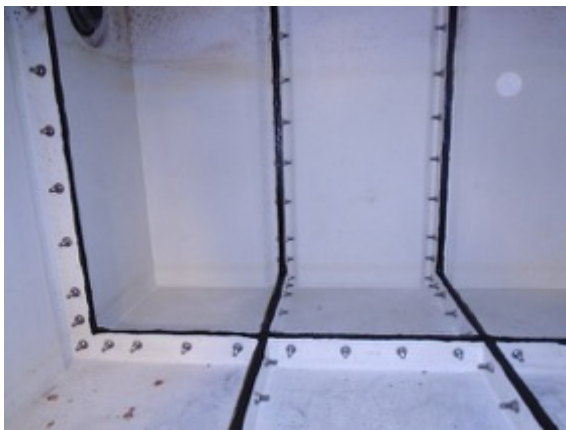
BEFORE – The tank was in fair condition but the butyl sealant had started to deteriorate and there was evidence of osmotic blistering and black mould spore growth which was particularly bad above the water line.



PREPARATION – The first stage was to cut back the excess damaged sealant and abrade internal surfaces.



A polyurethane sealant was then applied to all floor joints to fill the gaps and add additional strength to these critical areas.



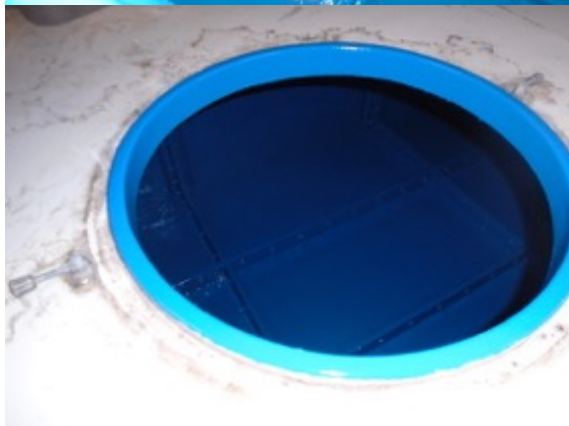


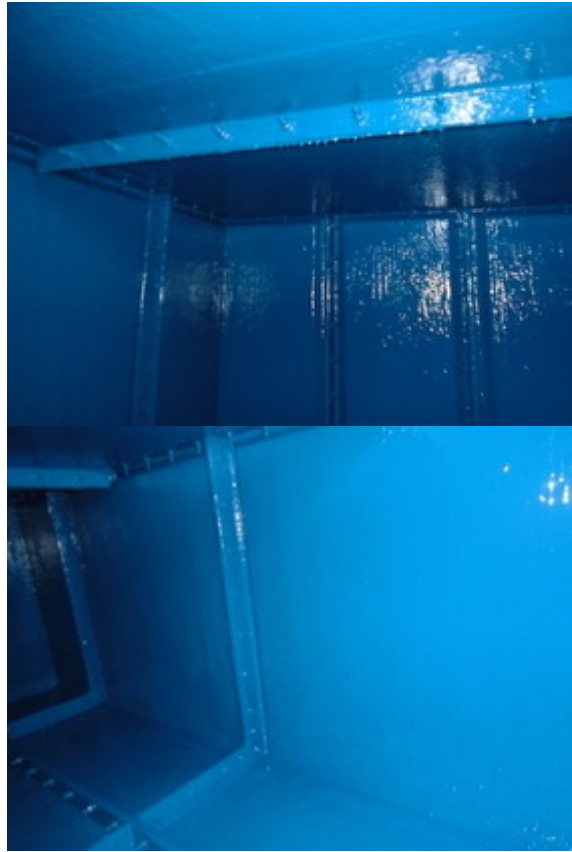
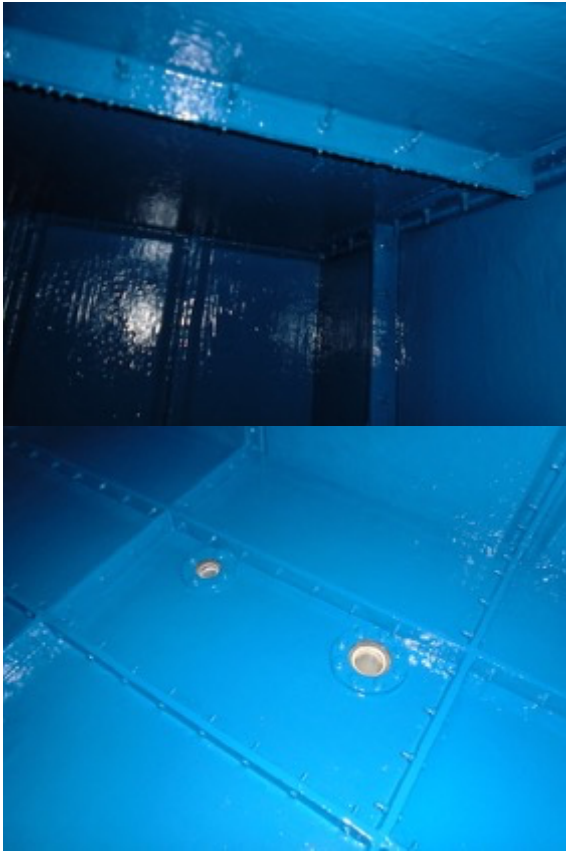
BASE COAT - All joints were stripe coated with a base coat (Grey) of ES 988 DWPU to build up the coating thickness in these critical areas to 2 – 3mm, before applying to all internal surfaces at a nominal thickness of 400 micron.



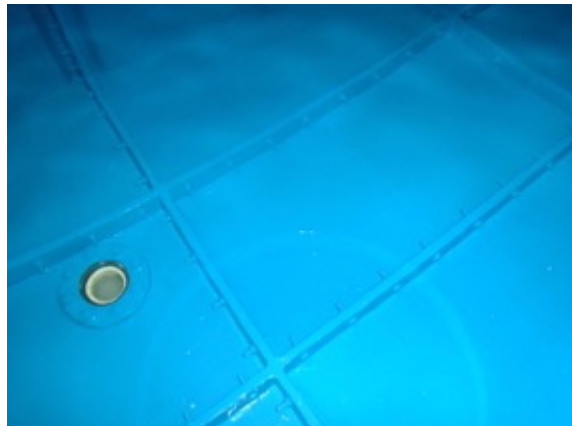
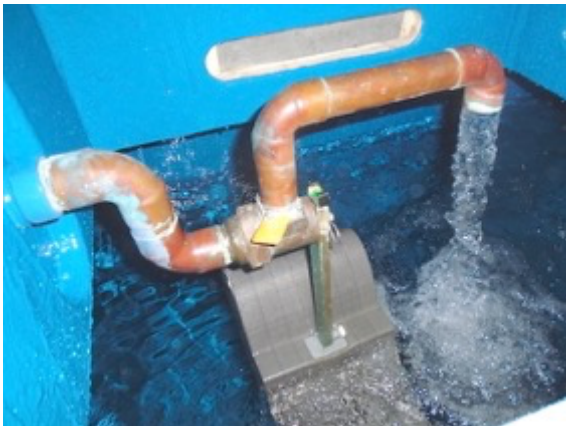


TOP COAT – The above was repeated with a top coat of DWPU.





DISINFECTION – Once the coating had cured, the tank was refilled and disinfected with SuperSil before being put back into service.





Certificate of Disinfection

CLIENT

SITE Buckingham Palace
Westminster
London
SW1A 1AA

DESCRIPTION AND LOCATION OF SYSTEM(S)

Cold water storage tank P5 – Core C

DATE OF CLEANING / DISINFECTION 25th March 2021

We hereby confirm that on the date shown, the above detailed system was disinfected to a specification meeting the requirements of **BS8558:2015** and **PD855486:2015**

ADDITIONAL COMMENTS

Disinfection of the cold water storage tanks was completed using SuperSil, dosed to 150ppm for a contact time of 1 hour, and then left in the system.

Terms, exclusions and conditions may apply.



Guarantee