

Reduce trade effluent bill for Hampshire Cosmetics

WPL Limited now offers a range of wastewater treatment options to aid compliance with discharge consent standards or to reduce trade effluent discharge costs.

Hampshire Cosmetics Ltd, a toiletries and cosmetics manufacturer based in Hampshire, could significantly reduce their trade effluent bill thanks to WPL Ltd's new approach.



Scope:

In 2008 WPL Ltd approached the manufacturer with an innovative method of significantly reducing trade effluent bills and the environmental impact of discharging trade effluent from its manufacturing plant in Waterlooville Hampshire.

During 2008 an estimated 45 m³ of effluent per day was produced and based on Mogden Formula calculations their trade effluent bill was running at nearly £10,000 per month with COD's (chemical Oxygen Demand) at 8,500 mg/l and s.s. (suspended solids) at around 800 mg/l. The bulk of the effluent is produced during the washing of the blending vessels and contains a wide range of residue from products such as creams and shampoos.

With potential annual bill increases from Southern Water of 10% per year the manufacturer realised their long term bills were likely to double within 5 years, significantly outstripping the rate of inflation and seriously impacting on overhead costs.

Solutions:

In initial talks with WPL Ltd, the manufacturer was proposing to install a full sized treatment plant on site and remove the resulting sludge by tanker. However, during this period WPL Ltd undertook site trial work, identifying a chemical regime that would reduce the COD to less than 2,000 mg/l, however this would increase s.s. and generate solids that would require removal.

With further works and discussions with Southern Water it was agreed that if the COD could be reduced, the resulting s.s. could continue to discharge to sewer negating the need for using expensive sludge removal techniques. The advantage to Southern Water is the COD is converted to solids and can be removed at the primary settlement stage in the treatment works, helping to reduce loading on the biological phase of treatment.

WPL Ltd has won a 5 year contract to supply capital equipment, service and chemicals. With the new treatment process in place to reduce the COD the charges from Southern Water have dropped significantly. Combined, these costs give the client an immediate saving of £1,750 on their previous monthly outgoings and effectively provide a buffer against any future increase in charges.

Summary:

WPL has 20 years experience in effluent treatment, with a wide range of internal skills and an extensive service team we offer continued development and support to all our customers. In addition



to the already experienced cost savings and convenience of the WPL contract hire option, Hampshire Cosmetics will see long term benefits too, as WPL will continue to install equipment to further reduce cost and enhance treatment.

The increased benefits are shared between WPL and the client, allowing continued development to meet either stricter future consent standards, or the introduction of equipment to further reduce costs.

WPL Ltd is an internationally-recognised leader in the design, manufacture and supply of standardised and bespoke environmental sewage, wastewater and commercial kitchen grease management process solutions.

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